

Canadian
Home Economics
Journal

Revue
Canadienne
d'Economie Familiale

Fall 1979 Volume 29, No. 4

Automne 1979 Volume 29, No 4

*Position: paper
Infant & Child Feeding
p 199*



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Revue Canadienne d'Economie Familiale

ISSN 008-3763

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Subscriptions are available to libraries, institutions and individuals not eligible for membership in the Association at the rate of \$12.00 per year (\$13.50 per year USA or Foreign) or \$3.50 per single copy.

The materials herein printed including advertising copy are the expression of the writers and not necessarily a statement of policy of the Association.

Cover design by Hilary Fedoruk

Typeset by Superior Typesetting
Printed by Co-op Press
Edmonton, Alberta

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Published quarterly
Canadian Home Economics
Association
L'Association Canadienne
d'Economie Familiale

IN MEMORIAM

CHARLOTTE S. BLACK



Charlotte Black was dedicated to her profession and worked tirelessly for recognition for home economics. After a lengthy illness, she died in hospital on May 11, 1979. She is survived by one sister and a brother — Dr. Elinor Black of Winnipeg, Manitoba and Dr. Donald Black of Kelowna, B.C.

Miss Black attended the University of Manitoba where she earned her Bachelor of Science (Home Economics) in 1925. She later did graduate work at Oregon State College, Kings College of Household Science, Teachers College at Columbia University where she received her Master of Arts in Household Arts Education in 1939, Iowa State College, and the University of Minnesota.

After graduating from the University of Manitoba, Miss Black moved to Vancouver to teach Foods and Clothing courses in several city schools over the next fifteen years. Also, in 1939, she was assistant to the Provincial Supervisor of Home Economics for the Department of Education in Victoria.

From 1941 until 1943, Miss Black was an instructor in home management at the University of Washington in Seattle. She then returned to Vancouver where she was an Assistant Professor in the Department of Home Economics at the University of British Columbia. In 1946 she was named Head of

the Department. In 1951, Miss Black became a Professor and Director of the School of Home Economics at U.B.C. She remained in that position until her resignation in 1965.

The Department of Home Economics, University of British Columbia, was established in 1943. There were sixty students, two faculty members, and one office. Under Charlotte Black's leadership, the School grew to an enrolment of 218 students, 43 Faculty of Education students, and 12 faculty members housed in a building that was constructed in 1949.

As a member of many professional and community organizations, Miss Black held leadership positions. She was chairman of the Scholarship Committee of the Canadian Dietetic Association, president of the Vancouver and District Home Economics Association 1945-46, president of the B.C. branch of the Canadian Association of Consumers 1954, and served the Canadian Federation of University Women from 1950-53 as a vice-president. In addition, she was a member of the Lower Mainland Dietetic Association, Advisory Committee of Gordon House Nursery School, Home Arts Committee of the Pacific National Exhibition, Education Advisory Board of Practical Home Economics Magazine 1950-54, and the Curriculum Revision Committee for the B.C. Department of Education 1962-64.

Miss Black was a founding member of the Canadian Home Economics Association. She was CHEA's first secretary-treasurer from 1939 to 1941 and British Columbia's first provincial director. She also served four years as the chairman of the Education Committee and four years as the chairman of the Constitution Committee. In 1953, she represented Canada as a Delegate to the International Congress of Home Economics in Edinburgh. She was chairman of the Convention Committee when CHEA met in Vancouver in 1956.

In 1964, the Canadian Home Economics Association presented Charlotte Black with the Honor Award in recognition of her dedication and contribution to her profession.

After her retirement in 1965, Miss Black enjoyed her home and her community activities. However, she had been troubled by polio for many years and eventually moved to Arbutus Private Hospital and Lodge. She was able to remain active until last year when she was hospitalized as the result of a serious stroke.

All of Charlotte Black's associates and students have benefitted from her friendship, dedication, and professionalism.

Pat Stearman
Provincial Director for British Columbia

CHEA IS YOU

Summer is over and Conference '79 is behind us. Our **40th anniversary conference** in St. John's, Newfoundland was a most happy and memorable meeting. Good representation from all ten provinces and the Territories added up to an excellent registration, including one charter member Louise Pettingell and six past presidents. Provided for our continuing education were meetings of the subject matter committees and a broad choice of sessions on the family, prenatal and infant nutrition, family health and the prevention of handicaps, children's needs and rights as citizens, fashion forecast and textile crafts. An excellent symposium on the fisheries industry and seafood quality and marketing, research reports and exhibits added further to our knowledge. The unique flavor of this Atlantic province was enjoyed through very special Newfoundland hospitality, stories and songs of the island, brewis, screech and a swim for a Newfoundland breakfast and, of course, the Lobster Boil as the final highlight.

The Association welcomes several new Board members including our first director from the Yukon — Northwest Territories. At the same time, our thanks go to those members retiring from the Board who have worked hard on our behalf. We trust that they will remain actively involved in CHEA.

The business meetings accepted a position paper on infant feeding, passed a resolution dealing with planning measures and services supportive of the increased participation of women in the work force, and planned for a position paper for 1980 on social issues related to the family. The **Canadian Home Economics Foundation Fund** which will accept memorial gifts, bequests and donations was officially launched. The presence of Mary Ann Parthum, past-president of the American Home Economics Association, and Gwen Tonge, president of the Caribbean Home Economics Association was greatly appreciated.

The Conference '80 committee are already busy arranging a professionally worthwhile event for us for next year, so plan to include Saskatoon, July 14 to 17th in your schedule for 1980.

The **International Development Workshop** in Halifax which preceded Conference '79 brought together home economists from several developing countries, northern Canada and concerned members of CHEA in an interesting program focussed on economic opportunities for women in develop-



Louise Pettingell, charter member and Betty Feniak, president, cut 40th anniversary cake.

ment. Formulation of a twinning relationship between the Toronto Home Economics Association and the Caribbean area and expression of CHEA's concern regarding rehabilitation of the schools in Uganda, particularly the home economics departments, were immediate outcomes of the workshop.

CHEA's involvement in home economics on the international scene was further evidenced by the presence of a group of CHEA members at the **Western Hemisphere Regionalization Workshop** of the International Federation of Home Economics in Guatemala City, August 8th to 11th. National needs, home economics capabilities to meet these needs, and hemispheric interaction and coordinated projects were discussed.

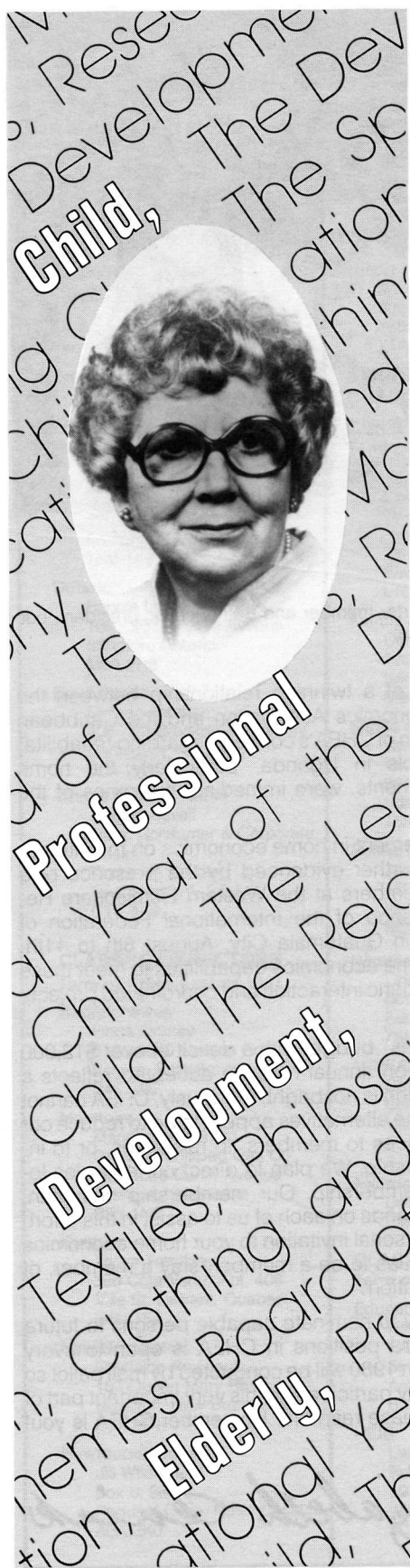
The "bare bones" budget with a deficit of over \$12,000 which the association annual meeting accepted reflects a financial picture which is not bright. Obviously, CHEA cannot go on in this way. The alternatives appear to be to reduce our operation and services to members, to raise fees, or to increase our membership. We plan to direct our energies toward increased membership. Our membership chairman, Janice Shivers, depends on each of us to assist in this effort. Won't you add a personal invitation to your home economics friends and colleagues to be a member, stay a member, of our national association?

The opportunity to nominate capable persons to future Executive and Board positions in CHEA is open to every member. Elections in 1980 will be conducted by mail ballot so that all members may participate in this very important part of the life of CHEA. Please respond. **Remember CHEA is you!**



PRESIDENT'S MESSAGE

Elizabeth Feniak



Journal Editor Retires

With this issue, Dr. Edith Down retires as editor of the *CHE Journal*. From 1977 to 1979 Edith Down worked tirelessly in this capacity. As a result of her leadership and expertise, the *CHE JOURNAL* has grown, changed and improved. The Association and the profession are indebted to her for so willingly undertaking this responsibility for CHEA. The Journal, since its inception in 1950, has undergone continuing metamorphosis. This is due to the talents and hard labour of the many dedicated people who worked for it and shared in its growth. Dr. Down certainly is one of those people.

Dr. Down's retirement from the Journal in no way implies a slowing of activities. She is actively engaged in historical research in the Kamloops area and in church related activities. She has our best wishes and kindest regards.

The Special Child —

For Every Low Point, a High Point

Guest Editor
Susanne Macdonald

Our son has more guts than Dick Tracy — he is now fifteen years old and has faced adversity for as long as he can remember. He remains loving, hardworking and beautifully aware of the silliness in life. He is also frustrated, misunderstood and terribly aware of the cruelties in life. In short, he is handicapped. His handicap is not severe compared to that of some children. He can walk, talk, learn and function in a relatively normal manner, but what sets him apart is that he is brain damaged.

I don't suppose any parents are prepared to have a handicapped child. We certainly were not. Our two daughters were normal, healthy babies but our son, Blaine, was born with hyaline membrane disease, a lung disorder which severely restricts respiratory function. The doctor told us it was up to our son: if he fought for every breath he would make it, if he gave up then we would face a bitter loss. Obviously Blaine fought, recovered, and is still fighting.

For four years Blaine was an absolute joy — bright-eyed, active and happy, but this was not to last. Shortly after his fourth birthday we began to notice what I now know as typical petit mal seizures (epilepsy). These were quickly diagnosed and medication prescribed but it was to be four more years and many combinations of medications, trips to the hospital, tests and specialists before the seizures were under control.

During this four year period our lives changed dramatically. At first the doctor reassured us that there were numerous drugs that would easily control the seizures. He felt that Blaine would continue to develop intellectually and physically like any normal child. In spite of heavy doses of medication the seizures continued to grow in intensity and number. A typical seizure was momentary loss of consciousness resulting in a sudden fall — usually causing a cut or bruise. On most days Blaine had over one hundred seizures.

Although Blaine attended kindergarten sporadically, most of his time was spent at home sitting on the couch wearing a hockey helmet and watching Sesame Street. By the time Blaine was six years old the doctor had tried all the medications available to him without success and as a last resort reluctantly put him on the ketogenic diet. This is a high fat, low carbohydrate diet (no hamburgers, no milk, no



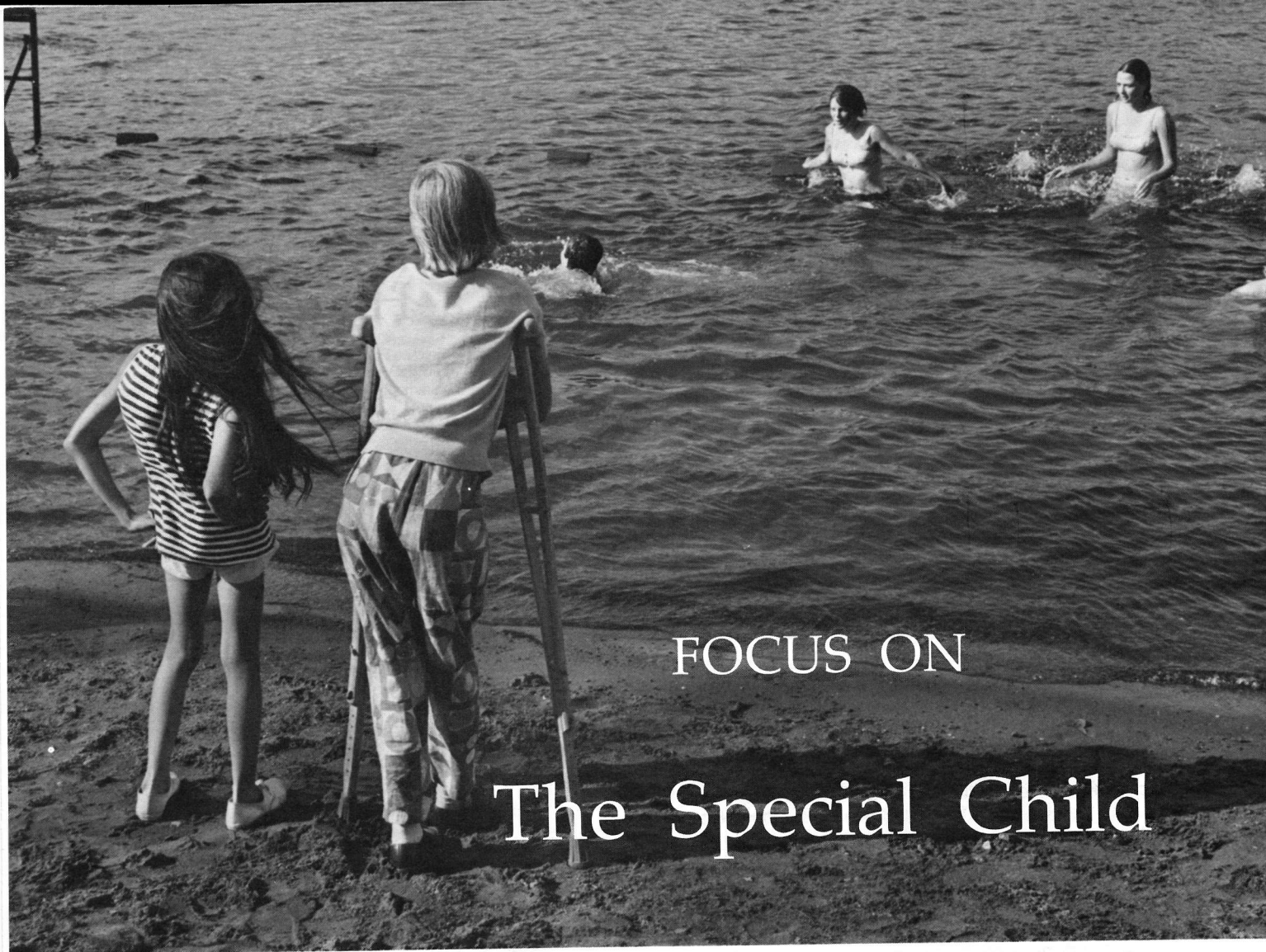
cookies) that is unpalatable, nutritionally unsound and extremely difficult to produce. The only positive result was that it did cause a decrease in the number of seizures. Blaine lived with this diet for thirteen months without complaint while his mother was driven up the wall by the radio and T.V. blaring "You deserve a break today". We had to stretch our imaginations to come up with solutions to such problems as birthday parties, Halloween, Christmas and Easter. On Halloween the three children went 'trick or treating' and came home to a 'Swap Shop' in our living room. Blaine was allowed to trade certain amounts of candy for certain small toys — a good deal for him as in a couple of days the girls' candy was gone but he still had his toys.

At this time we moved to Vancouver and finally found a neurologist who could help Blaine. This doctor put Blaine in the hospital for three and one half months during which time he was taken off the diet and put on a new drug, rivotril, which eventually controlled the seizures.

Until this time our main concern was with problems related to the seizures. Now we had to face the broader problems of education and social development. We enrolled him in a special class at our neighbourhood school. It was not a good year but it gave us time for a thorough assessment.

(Continued on page 184)

Susanne Macdonald graduated with a B.Sc. in Home Economics (Dietetics) from the University of British Columbia in 1956. After completing a one year course in Administrative Dietetics at the University of Washington she worked for almost three years as a home economist for B.C. Electric. Susanne and her husband James, live in Vancouver with their three children, Linda, 18, Moira, 17 and Blaine, 15.



FOCUS ON

The Special Child

Courtesy of National Film Board of Canada

*It is not growing like a tree
In bulk, doth make Man better be . . .
In small proportions we just beauties see;
And in short measures life may perfect be.*

Ben Jonson

In recognition of the International Year of the Child, the theme for the 1979 issues of the Canadian Home Economics Journal has been 'The Child'. The focus has been on the Developing Child, the Relating Child, the Learning Child and the Special Child in the Winter, Spring, Summer and Fall issues respectively.

How To Understand Learning Disability

J. P. Das
*Centre for the Study of Mental Retardation
University of Alberta*

ABSTRACT

Learning disabilities can only be understood in terms of the underlying processes. These processes are cognitive rather than perceptual in nature, they are complex, and may evolve in successive stages. One view of the cognitive processes, in terms of coding and planning is discussed. It is concluded that effective remediation has to be based rationally on theory. Remediation will be successful when we have distinguished between types of learning difficulties, studied them developmentally and understood them in terms of the function of the mind.

ABSTRAIRE

On ne peut comprendre les difficultés d'apprentissage qu'à la lumière des processus profonds qui les caractérisent. Ces processus, à caractère plutôt cognitif que perceptif, sont de nature complexe et peuvent se développer en plusieurs étapes. On y traite d'un point de vue sur les processus cognitifs en fonction de la modification et de la planification. On en vient à la conclusion que pour comprendre et traiter de façon efficace ces difficultés, il faut se fonder rationnellement sur la théorie. La compréhension, et avant tout le traitement, ne portera fruit que lorsque l'on aura bien discerné les divers genres de difficultés d'apprentissage, que l'on aura étudié leur développement, et que l'on en aura une bonne compréhension par rapport au fonctionnement de l'esprit.

Some ten per cent of children in elementary school are supposed to have problems in reading. These children are often called the learning disabled. They are usually sent to resource rooms for special coaching. Prior to that most of them might be seen by a psychologist who assesses their intelligence and sometimes their reading ability. Neither the psychologist nor the teacher fully understands learning

disability. The parents are not often satisfied that the remediation programs given in the school are the best. Such confusions are compounded by conflicting views of what constitutes learning disability and what causes it, specially when these views are attributed to respectable groups of professionals such as physicians, psychologists and educators.

First, let us understand what is meant by learning disabilities. One could write an entire book on the definitions of learning disabilities. So varied are these definitions that the term hardly has a denotative meaning. "Probably one should disregard the term and consider

the various problems of the heterogeneous community of the learning disabled as learning difficulties. Difficulties is not a pejorative label: it invites the specialist, be he or she an educator or a physician, to examine learning difficulties with a view to remediation. Learning disability, particularly when defined to include minimal brain damage, is sometimes classified as a pathological syndrome. Although one may look upon instances of learning disabilities within the psychopathology of cognition it is hardly a disease. The purpose of labeling children should be to identify a group to receive certain services: it should not attempt to elevate the

A native of the State of Orissa, India, Dr. J.P. Das came to Canada to the University of Alberta in 1968 after having taught and done research at the Universities of London, Utkal and UCLA. His current interests are in cognitive processes and intellectual deficit.

difficulties of children to the status of a disease." (Das, Kirby and Jarman, 1979, p. 101).

Although in the field of learning disabilities there is a considerable proliferation of terms and concepts, and the lack of a unifying model for understanding cognitive deficits, nevertheless most theoreticians and practitioners believe that the child with learning disability has predominantly some sort of cognitive difficulties. That is, the difficulties are not so much in sensory or perceptual processes but in forms of thinking.

"Motivation has to taken for granted if any learning is to take place".

The idea that the learning disabled child has a problem in thinking and not in perception was not easy to accept. As one would imagine, the relationship between visual preception or auditory perception on the one hand and reading and listening in the classroom on the other is rather direct. While learning to read, the child must decipher the printed symbols that are on a page. This obviously involves not only the discrimination of shapes and forms and patterns, but also the breaking down of complex words into certain patterns of elements or letters. And finally, what is required of the reader is the recognition of the visual patterns that involve words as meaningful units. No wonder therefore that reading specialists spend hours on end trying to teach children to discriminate among letters of the alphabet, grouping alphabets and finally teaching them how to recognize a certain combination of the alphabets as words and probably also to teach them how to better the child's visual memory.

Reading is sometimes described as cross-modal coding, translating the printed material into speech. In everyone's experience it must be common that we first learn to speak and therefore speech becomes the basis of understanding all written material. A simple test demonstrating that while reading speech is essential for understanding is as follows: Try to read a passage with your mouth wide open. See how much you comprehend or how long it takes to finish reading it until you comprehend. Compare such an exercise with reading a similar passage of

equal difficulty normally, that is letting your mouth assume it normal posture as you are reading. You will find that comprehension is substantially slowed down when you read with your mouth wide open and thus saying subvocally what you are reading.

It is obvious then that both visual and auditory perception are involved in reading. However seeing and hearing do not guarantee comprehension of what we read. The intellectual processes which help us to analyse what we read, to relate what we read to what we already know are crucial to comprehension. Even while learning to read words or strings of words or to follow a syntax, the teacher would tell us that the child must use sequencing in order to succeed. Sequencing is one of the aspects of what is called successive processing, the processing of discrete events into a temporal order. I shall explain in some detail the nature of successive processing and its alternative, simultaneous processing in a subsequent part of this paper. At the moment let me continue with what reading as a skill might involve.

Apart from the sensory processes and the intellectual processes, motivation of course has to be taken for granted if any learning were to occur. Many children do not read because they do not find any reason to read. I remember seeing the review of a book on how to teach disadvantaged children such as those who are growing up in urban slums to read. The reviewer of the book said that the author has missed the point completely. Instead of delineating the ways and means by which one might be able to teach ghetto children to read the author should have asked the basic question, "Why a child in the ghetto would like to read."

Currently the majority of research on learning or reading disabilities point out that given the same variations of IQ and a fair amount of motivation there are large differences in reading abilities among children. In other words children who are found to be backward in reading may not differ in their IQ and motivation from their classmates who have no reading problem.

Reading disability and learning disability have been used interchangeably because the majority of so called learning disabled children have primarily a problem in reading. We admit that there are varieties of reading problems. How does one go about classifying

them? The first thing to do perhaps would be to distinguish specific reading disability or specific learning disability from nonspecific ones. The terms currently in vogue are specific reading disability versus reading retardation. Suppose a child has an IQ of 90. He is 8 years old and should be reading at grade 2. He reads at the level which is equal to beginning grade 1. Compare this child with another who has an IQ of 120 and is also 8 years old and he is reading at the same level. The first child will most probably be called reading backward whereas the second may be suspected to have specific reading disabilities. These two children obviously differ in their IQ, and on the basis of their IQ one would expect that the more intelligent child should be reading at a higher level than the less intelligent child. If a child's reading level is two years or more behind the level at which he is expected to perform in terms of his grades and IQ then such a child's performance would be classified under specific reading disabilities. On the other hand as in our example, if the first child is performing more or less at the level which is expected from his IQ, then he might be really called a backward reader. Specific reading retardation, specific reading disability and dyslexia are terms which have the same meaning in the literature. They all allude to a basic deficit in cognitive processes and perhaps indirectly relate to higher cortical structures.

"Children who are found backward in reading may not differ in their IQ and motivation from their classmates who have no reading problem"

Children with reading disabilities have also been classified in terms of the Weschler intelligence test for children as those who have high performance with relatively low verbal IQ, differing as much as 15 points or more. The majority of children with reading problems have higher performance than verbal although a minority have higher verbal than performance IQs. Obviously linguistic retardation characterizes the majority of children with learning disabilities.

A different method of classifying the heterogeneous group of learning dis-

abled or reading disabled children is to analyse the nature of their reading difficulty. Some of them (about 63%) cannot read phonemes when given a word but have only sight vocabularies. On the other hand 9% of the children who are called reading disabled can read phonemes but not the whole word which leaves 22% of children who cannot read either full words or phonemes. I will give one more example of classifying reading disability. The classification is more closely related to cognitive processes than the others. There are three categories of children with reading disability: those who demonstrate a deficit in comprehension, those who have difficulty in auditory-visual association, and those who have particular problems with phonic analysis and sequential perception of words. Obviously the first one relates to comprehension and the last one to what is called decoding skills in reading. The middle is in between, leaning slightly more towards comprehension than decoding.

In review, it should be observed that none of these classifications have depended on sensory handicaps in the reading disabled child. In other words none of them have indicated that the difficulty of the reading disabled child may lie in either visual or in auditory perception by itself. Wherever such difficulties are encountered these are strongly related to cognitive processes. It should also be made clear at this point that no known neurological basis has been established for reading disabilities or for dyslexia (Benton, 1975). Wherever neurological functions are alluded to they have been understood in terms of cognitive functions. For example, consider the disparity in processing in the left and right hemispheres of the brain. The left is usually considered to be related to linguistic functions whereas the right to spatial relationships. The cognitive difficulties of learning disabled children can be related to language or processes that depend on the verbal system, hence on the left-brain. But explanations of learning disabilities which are based on neurological damage to the left-brain cannot be supported by research. In fact, implied brain damages in learning disability of one kind or the other are mostly speculative in nature at the moment and have been dubbed as neuromythic explanations.

What cognitive processes then are affected adversely in learning disability?

Going to the literature one discovers that most of these concern memory, either short-term memory, or semantic memory which is long-term. Short-term memory for shapes and linguistic units are most frequently mentioned as associates of learning disabilities (Torgesen, 1978). However analysing memory further, it has been mentioned that the learning disabled child might have the same capacity as a child without learning disability; but he does not use appropriate or efficient strategies for remembering shapes or words.

Memory could be described as having two primary aspects to it, the structural and control processes. The structural processes may depend on neurological and/or the psychological base of memory which are not usually under the conscious control of the learner. These may refer to, for instance, such capacities as items a person can remember, the rate at which forgetting may occur, and the speed with which one can scan memory. Probably the best way to describe differences in structural processes would be to compare a severely retarded child's memory with that of a very bright child. However it is difficult to attribute aspects of memory performance to structure only and declare that these are independent of control processes.

Control processes have reference mostly to strategies that a person uses when faced with a task of memorizing a series of shapes, words or numbers. The child may like to chunk the material that is presented to him for remembering. He may associate the material actively with images or actions. He may review the material knowing that he is required to recall them after a certain length of time. He may spend more time in studying the material if it is to be recalled in detail. In other words these processes are under the control of the individual learner.

"No new neurological basis has been established for reading disabilities or for dyslexia".

Memory is just one of the cognitive processes which are so numerous that they in themselves must be understood in broad categories. We have used a system of classifying cognitive processes

in terms of coding and planning. Any individual during his or her waking life is bombarded with various sorts of information which need to be sorted out, analysed, synthesized and understood for their relevance to the individual. These are essentially coding activities. An individual not only codes information but he or she prepares a plan or a strategy to deal with the information, to use the information in solving problems.

"Intelligent behavior consists in a parsimonious use of coded information for attaining a goal"

He/she plans actions, makes decisions, formulates programs and follows the programs which have been formulated. The individual is sensitive to the consequences of his/her action and may modify actions in the light of these consequences. He/she not only adopts strategies for solving problems, but sometimes creates problems which need to be solved. These higher mental functions require first of all information to be coded and to be carried in memory so that they can be retrieved at appropriate times. 'Planning and decision making' is the general name given to these activities. In ultimate analysis, intelligent behaviour consists in a parsimonious use of coded information for attaining a goal.

Coding and planning then, describe two major functions of the human brain. The notion is taken from the Soviet neuropsychologist Alexander Romanovich Luria. After years of work on patients with brain damage he arrived at three functional units which could be identified. The functions were broadly named as **arousal** which is most easily identified as attention and motivation and is located generally in the brain-stem including structures such as the reticular formation, thalamus and the hypothalamus. The second function is **coding** which is located in the temporal, occipital and parietal lobes and partly in the frontal lobe adjacent to the temporal lobe. Finally, the third function is **planning and decision making**, located generally in the frontal lobe.

There are two forms of coding, which are simultaneous and successive. Information is coded in parallel or in sequential form. Simultaneous coding

involves the integration of separate elements of information into simultaneous groups. The grouping is quasi-spatial in nature. Successive processing, on the other hand, means coding information into sequential or successive series which are distinguishable in terms of time. Simultaneous processing is coding which helps one to discover the relationship between two or more objects or ideas; thus it may involve both verbal as well as nonverbal information which is coded simultaneously. For example, in a nonverbal task such as copying a design, simultaneous coding is as much a necessity as in a linguistic task such as understanding the distinctions between 'father's brother' and 'brother's father'. Successive coding likewise is a necessity for both verbal and nonverbal material. For example, in producing skilled movement, as well as in narrative speech successive coding is essential. I have described in great detail not only the nature of these coding processes but also their application to reading (see Das, Kirby and Jarman, 1979).

"Intelligent behavior consists in a parsimonious use of coded information for attaining a goal"

How do we understand reading disabilities in terms of coding and planning? I wish to answer this by briefly summarizing our research. Reading disability is manifest in recognition of words and in comprehension. Word recognition is found to be consistently related to successive processing whereas comprehension is closely associated with simultaneous processing. In addition to these, the reading disabled child often is not proficient in planning, for example, in planning a composition. The thread of successive and simultaneous processing runs through the two major types of reading difficulties mentioned earlier which are the perception and memory for complex forms and auditory-linguistic deficiencies (Vernon, 1979). Perception and memory of complex forms is poor in one kind of reading disability whereas auditory-linguistic deficiencies are prominent in the other kind. We have concluded that reading disability needs to be understood in the context of read-

ing ability; that is, in terms of the processes which are involved in the acquisition of reading. Our work has suggested that appropriate strategies as well as these two processes of coding are important for learning to read or failure to do so. Studies relating simultaneous and successive processing to reading suggest that among the less fluent readers, successive processing accounts for more variance in reading scores than does simultaneous processing. Our work has suggested that appropriate strategies which relate to planful behaviour as well as coding are important for learning to read or failure to do so. The reading disabled children are found to be inferior to nondisabled children in several coding tasks despite the fact that they are matched on nonverbal IQ (Das, Leong and Williams, 1978). Thus we infer that part of the reason for poor performance of the reading disabled children in coding tasks may be found outside coding, perhaps in the strategies and plans of attack employed when the child is faced with a new problem to solve.

I wish to emphasize the advantages of an information processing approach to learning disabilities. First of all such an approach makes it possible to relate performance to cognitive processes and hence facilitates the development of remedial measures. Because the processes underlying reading disability are based on a general model of cognition, methods to remediate the disability can be firmly based on a theoretical rationale. Much research and practice in the field of learning disabilities has suffered either from an absence of a theoretical base such as the one proposed here, or by practicing remediations which are far removed from research and knowledge in the field of reading. Research and practice in the field of learning disabilities should not remain insensitive to progress in the psychology of cognition or advances in child development.

A remediation program stemming from our research on reading disability has assumed that deficits in planning and coding functions are the antecedents. The programme has been prepared and tried out. We have had some success with the program specially in the area of word recognition and word attack skills.

Much remains to be done in the field of remediation for reading disabilities. One has to identify the levels of reading achievement, because distinct proces-

ses might be salient at different levels of achievement. Further, one has to relate reading disabilities to a developmental study of cognitive processes because the deficits may be unique to a certain age. For example in a longitudinal follow-up of reading disabled children it is possible to find that a child at grade 2 may have a relative competence in simultaneous coding but incompetence in successive, which may be overcome later as the child matures. As another example, the usual discrepancy between performance and verbal IQs of learning disabled children is not found in younger children, although it is characteristic of older ones.

"The reading disabled child is often not proficient in planning"

Apart from considering the above, it is absolutely essential to develop methods of observing how a learning disabled child might be approaching a task. In other words to delineate in a certain manner the strategies that the child is using in solving the task at hand. It may not necessarily be a reading task. Such information may then enable us to relate the actual difficulties of the child in reading with the strategies that he uses. I believe that in order to formulate individualized remediation programmes we require a clinical knowledge of the difficulties of the reading disabled child as well as research into the development of coding and planning behaviour in children. •

References

- Benton, A.L., Developmental Dyslexia: Neurological aspects. In W.J. Friedlander (Ed), *Advances in Neurology*, 7, 1 - 47.
- Das, J.P., Leong, C.K. and Williams, N.H., *Simultaneous and Successive Cognitive Processes*. New York: Academic Press, 1979.
- Das, J.P., Leong, C.K. and Williams, N.H., The relationship between learning disability and simultaneous-successive processing. *Journal of Learning Disabilities*, 1978, 11, 618 - 625.
- Torgesen, J.K., Performance of reading disabled children on serial memory tasks: A selective review of recent research. *Reading Research Quarterly*, 1978, 14, 60 - 87.
- Vernon, M.D., Variability in reading retardation. *British Journal of Psychology*, 1979, 70, 7 - 16.

The Needs of the Native Child

*The Canadian Council on Children and Youth set up a Task Force which identified four basic needs of children: health care, protection, economic support, and education. The Task Force recognized the child's need for continuous and loving care and acknowledged the family unit as providing the best environment for the child's healthy development. Their report, as presented in **Admittance Restricted: The Child as Citizen in Canada**, takes the view that our legislation should define minimum positive standards of care rather than limiting itself to neglect, as at present. A separate chapter of the report has been devoted to native children. Of the children in Canada, these are the most seriously at risk. The first part of the chapter follows.*

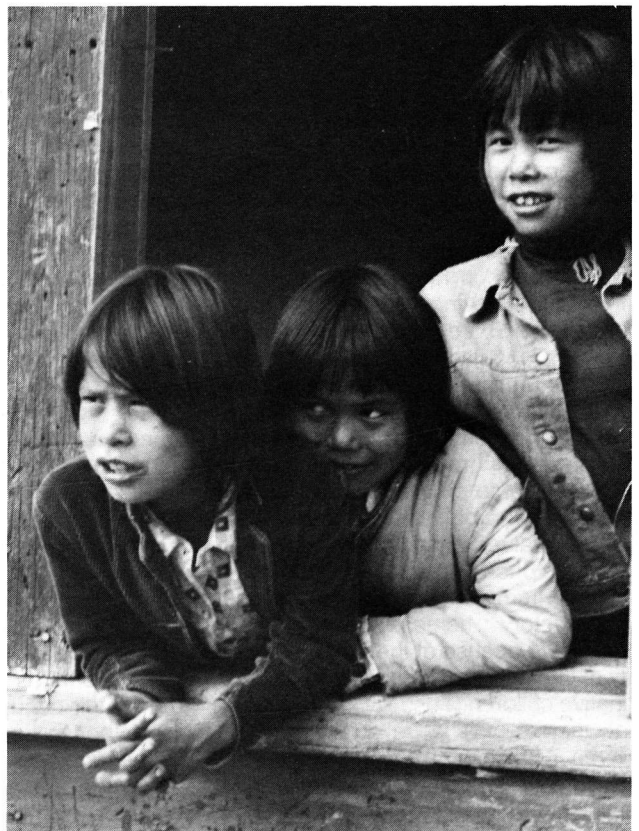


Photo courtesy of Mary Vanson

OVERVIEW

The Native Community

If the average Canadian child suffers systematic and continual discrimination through society's attitudes and actions, the native child suffers doubly as a powerless member of a minority group whose traditional way of life has been ravaged by the incursions of our civilization.

It would be wrong, however, to state that the native way of life has wholly vanished. Despite the passage of 450 years during which the native communities have been subjected to a powerful and alien European culture, "an underlying residue of an essentially hunting and gathering type of culture with its more or less characteristic value and organizational configuration" still survives. In some instances, especially within remote areas, these traditional elements are more than a "residue" and retain a genuine vitality. More recently, there has been a revival of traditional culture, even among na-

tive people living near urban concentrations.

The enduring of these traditional elements within native communities has not prevented their borrowing and our arbitrary imposition of "an overlay consisting of a thin veneer of disparate ideological, technological and organizational elements . . . from [our] post-industrial society." In addition, despite a new assertiveness on the part of native communities much of the real political and decision-making power over their lives still rests with institutions of the predominant white society.

The result has not been a happy one. The traditional and European elements have not combined into some new and higher synthesis. There is, instead, a destructive tension between these two opposite poles of the native people's existence. In many areas, the ecological systems which satisfactorily supported the traditional economy have been destroyed. At the same time, native persons who adopt white man's ways are regarded as traitors to their people and, more often than not, encounter discrimination in white society which ensures that they will remain socially and economically marginal. Meanwhile, as Justice Thomas Berger pointed out about northern peoples,

"massive government intervention in the people's lives . . . has undermined their traditional independence and self-esteem creating social and psychological dependence." The outcome has been poverty and social disorganization in a psychological environment of mutual suspicion and hostility between the races.

The Native Child

Native children are extremely vulnerable in this situation. They were not always so exposed. In the past and, to a degree in the present, the extended family ensured that children did not lack succour even if something happened to their natural parents. A powerful communal ethic also meant that food and clothing was shared among members of the community both young and old. Traditionally, native peoples were also kinder to their children than Europeans. "Corporal punishment was far from lacking, but it was generally less frequent and less severe than in European cultures and their derivatives." To many native peoples, the child was "a haven of refuge for the wandering ancestral soul" and thus even punishment or reproof was generally accompanied by an apology. In some ways, then, the native child was

*Drawn from Chapter 6 of the report. **Admittance Restricted: The Child as Citizen in Canada**. Published by the Canadian Council on Children and Youth, 323 Chapel Street, Ottawa, K1N 7Z2. By permission.

more a citizen of native society than his or her white counterpart was of European society.

Though in some cases more secularized, this approach to child-rearing still survives to some extent. The sharing ethic and extended family still provide protection for the child in many native communities. But poverty and social disorganization have also resulted in a much higher incidence of family breakdown, alcoholism and other social disorders than among the general Canadian population. Many native children are, therefore, seriously at risk.

In these circumstances, native children have, in growing numbers, become subject to provincial and federal authorities who do not share or understand the values of the native community but are often eager to remove these children from what they regard as unsatisfactory home environments. Moreover, because of the general poverty of the native community, the health of native children is usually more at risk than that of their white counterparts.

Even if their families do not break down, native children will generally still be subjected to an educational system shaped largely by values alien both to themselves and to their families.

In the areas of economic support, health care, protection and education, the concepts of the child's best interest and the child's individuality of interest have in the past been used to justify white authorities severing the native child from his or her family and community. Such actions usually arise from an unthinking and insensitive application of white standards to home and family life in native communities. More often than not, such actions are as damaging to the children as they are resented by native communities.

The Jurisdictional Divisions

At the outset, it is necessary to make some fundamental distinctions. Native people in Canada fall into three categories: status Indian, Métis and non-status Indian, and Inuit. The jurisdictions into which native people fall and the legislation governing their children vary depending upon the category to which they belong.

Status Indians are Indians belonging to bands for which a reserve has been set aside because of a treaty or political arrangement with federal or colonial authorities. For the most part, their well-being is a federal responsibility and they are registered as Indians

under the *Indian Act*. In 1976, there were 288,938 Status Indians in Canada. Of these 155,643 were 19 years old or younger. About 70 per cent of these persons still live on reserves or Crown land.

Métis and non-status Indians perceive themselves as Indians, but are not registered as Indians under the *Indian Act*. From the standpoint of that Act, they are not Indians and thus have no reserves and do not receive the many services which the federal government provides to status Indians. According to the Canadian Association in Support of Native Peoples, however, "They share with their status Indian 'cousins' a general isolation from white society which may include language differences, perpetuation of the poverty and welfare syndromes and lack of opportunities for decent employment due to poor education and discrimination." There are roughly 750,000 Métis and non-status Indians in Canada, about two-thirds of whom are minors.

The Inuit occupy the treeless areas along the Arctic Ocean. The Inuit in Québec are now registered as Indians under the *Indian Act* and, for the purposes of this discussion, shall be viewed as Indians. The Inuit in the Northwest Territories come under the jurisdiction of the Territorial government which in turn reports to the federal Department of Indian and Northern Affairs. There are more than 22,000 Inuit in Canada. It should be noted that Métis and Indians living in the Yukon and Northwest Territories also come under the jurisdiction of territorial Councils and through them the Department of Indian and Northern Affairs.

The Security of the Status of the Indian Child

In many ways, status Indians are the most privileged of the three groups. Their rights to land have been recognized in treaties and legislation. They receive a host of services specially shaped — although all too often by a colonial tradition — to meet their needs. Their legal status as Indians is enshrined in the *Indian Act*. For these reasons, it may throw some light on the position of the native child in Canadian society to examine how secure registered Indian children are in their Indian status.

In some instances, even parents are unable to prevent their children from losing Indian status. For example under Section 2-2 of the *Indian Act*, a

band may protest the Indian status of an illegitimate child, even if the mother has Indian status. The child in question will lose Indian status if the Indian Registrar, the department officer responsible for the official list of status Indians, is satisfied that the child's father was not a status Indian. The child cannot appeal such a decision; the status of the father is the only relevant consideration.

Legitimate children of status Indians can also lose their Indian status because of their parents' actions. For example, under Section 12-1(b) of the *Indian Act*, if a status Indian woman marries a non-status man, she and her children automatically lose their Indian status. This provision is blatantly sexist: no similar provision applies to the status Indian man if he marries a non-status woman. The raising of this human rights issue in the Corbière-Laval case was bitterly contested by Indian organizations whose members feared that the Canadian Bill of Rights might be used to undermine the special status of Indians under the *Indian Act*. Their victory demonstrated that the principle of *patria potestas* is still alive and well and enshrined in the *Indian Act*.

The principle of *patria potestas* also would seem to have influenced Section 109-1 of the *Indian Act*. If an Indian male applies for enfranchisement — that is, loss of Indian status — and he is legally an adult, capable of acting as citizen and able to support his dependents, the Governor-in-Council may remove his Indian status, along with that of his wife and children. Only if the wife and children are living apart from the husband can they avoid this automatic loss of their Indian status. No consideration is given to the individual interests of the children involved.

It should be noted that, in these situations, the children will only lose their status if they are minors. If they have attained the legal age of majority, the parents' loss of Indian status will not affect their own. The Department relies on provincial legislation to determine the age at which a child legally becomes an adult. "Because the age of majority varies from province to province," states Douglas Sanders, "a status Indian child may lose status . . . in one province, though he would not lose status if he lived in a province where he could be defined as no longer a minor."

It is thus apparent that, legally, children can often do little to prevent the

loss of their status as citizens in reserve Indian society. Such decisions are the preserve of their parents, the band and the Department. It is an administrative practice of the Department to ask the children to consent to their loss of status if they are over 16. However, this practice is not enshrined in either legislation or regulations, nor does it provide children under 16 with any control whatsoever over their status. In effect, the parents and the Department, in requesting and approving the enfranchisement of the family, usurp completely the children's right to determine whether they will retain Indian status.

If status Indians are the most privileged of Canada's native peoples and the rights of their children to retain that status are this precarious, then one can only shudder at the situation of the non-status Indian, Métis and Inuit children.

THE NEED FOR ECONOMIC SUPPORT

In all but the most remote parts of Canada, the arrival of the white man damaged if it did not destroy, the traditional native economy based upon hunting, gathering and some agriculture. Where this economy still exists, it "has come to be associated with relative poverty and deprivation." A participant in that economy "must often accept a low income and, in relation to the values of the white world, a lower status than those who do not." Nonetheless, where the traditional economy survives, it probably provides a better living for more people than the modern wage economy. As René Lamothe, a Métis, pointed out to the Berger Inquiry, "The hunting economy permitted a man to support an extended family: whereas the wage economy does not adequately support an immediate family within the expectations that the industrial economy raises."

Unfortunately, even partial participation in the hunting economy is a viable alternative for only a small proportion of Canada's native people. The rest must survive within the wage economy. In 1971, the average annual income of all native peoples was \$2,976.41 compared to a national average of \$5,033.27. More than a third earned no income whatsoever. In 1974-75, status Indians employed on reserves in economic development projects sponsored by the federal Department of Indian and Northern Affairs worked an average of only 6.6 months and earned

an average annual income of \$1,780.21. In 1972-73, more than half the on-reserve Indian population was dependent on welfare. The overall picture is one of grinding poverty, only somewhat ameliorated by a reliance on fish and game where these are available.

The continued survival of the sharing ethic and the extended family may afford some protection to the native child in these circumstances. But even these values and social patterns continue to be eroded by our industrial civilization.

The proportion of children in the native populations is far greater than in Canadian society as a whole. According to the 1971 census, the average number of children born to married native women was 4.69, in comparison to 2.78 for all such women in Canada. In 1976, there were also more illegitimate than legitimate births among the registered Indian population.

These figures on illegitimate births should be interpreted cautiously because most native people regard the distinction between legitimacy and illegitimacy as a white creation. For many native people, "the formalities of marriage and divorce" have been relegated to the category of white impositions on native life. This situation is worsened by uncertain legal status under the *Indian Act* and in British Columbia and in the northern territories of marriage by Indian custom. In these circumstances, it is not surprising that many native people fail to get legally married or divorced, with the result that by legal standards their children are often illegitimate. The "increasing frequency of domestic switches" has intensified this problem.

Even if native communities were wealthy and characterized by a stable extended family structure, the large numbers of children, both legitimate and illegitimate, would constitute a challenge. Because the majority of native communities are characterized by poverty, cultural dislocation and a high incidence of family breakdown, these children are often gravely at risk. There is clearly a serious need for special provisions to ensure that native children whose parents have deserted them or died receive the necessary economic support.

For the most part, it is the children's maintenance legislation in the jurisdictions where native people live which ensures that their children receive that support where necessary. Provincial

legislation in the area of children's maintenance even applies to the status Indian population living on reserves just as it does to Métis and non-status Indians. Inuit, Indian and Métis living in the Northwest and Yukon Territories come under territorial legislation. In all cases, there is a need for special provisions in such legislation to take into account the unique needs of native people. Officials implementing such legislation should also be cognizant of and responsive to these needs.

For the status Indian population, there are also some special maintenance provisions in the *Indian Act* which apply to band and treaty monies administered by the Department of Indian and Northern Affairs. Because all of this money is administered by the Department, it is not difficult to ensure that the spouse and dependants actually receive the money in question. In other words, it is possible to avoid the problems faced by other jurisdictions in enforcing maintenance orders. It should be noted however, that for status Indians who do not belong to the few wealthy bands in Canada, these payments are usually quite small.

There is another sense in which the maintenance provision in the *Indian Act* does present a favourable contrast with provisions elsewhere: it does not discriminate against dependants deserted by their mothers. Section 68-2 of the Act states: "Where the Minister is satisfied that a female Indian has deserted her husband or family, he may order that payments of any annuity or interest money to which that Indian is entitled shall be applied to the support of her family."

The illegitimate child is also eligible for support under this maintenance provision. Under Section 68-3 of the Act, the Minister may stop the payment of interest money and annuities to either or both parents and use this money to support the illegitimate child. There can be little doubt, however, that the legitimate child of either parent has priority in these circumstances. The Act states that this attempt to support an illegitimate child must not "prejudice the welfare of any legitimate child of either Indian."

With the exception of these maintenance provisions pertaining to treaty money and annuities, status Indians are subject, like everyone else, to provincial children's maintenance legislation. There is, however, one problem: maintenance orders from

(Continued on page 180)

The Autistic Child: The Special Child

Diana Rosen

ABSTRAIRE

L'autisme chez l'enfant demande une attention sérieuse. L'autisme est décrit par un repliement sur soi, une forte tendance à l'introversion et l'égoïsme et par la pensée détachée de la réalité extérieure. Environ la moitié de ses enfants n'ont jamais eu la parole et l'avenir pour l'adolescent et l'adulte autistique n'est pas favorable. On discute l'autisme, ses caractéristiques, sa nature, ses causes, et les méthodes de traitement. L'emphase est dirigée sur les relations familiales et sur les problèmes de l'enfant autistique et ceux de ses parents.

ABSTRACT

Autism is a severe childhood disorder requiring serious attention. It occurs in four or five cases per 10,000 births and is characterized by the child's extreme "autistic aloneness", his avoidance of social contact, and his rigid insistence for the "preservation of sameness". About 50% of these children never gain speech and the overall prognosis for the autistic adolescent or adult is not a favourable one. It is the intent of this paper to discuss autism in light of its defining characteristics, its nature and cause and its methods of treatment. Emphasis will then be placed on the nature of the parent-child relationship and the problems that confront the autistic child and his parents within the larger community.

Introduction

A child sits on the floor transfixed by a sunbeam as it dances its jumbled pattern on the wall. He watches this sunbeam for hours and hours and absorbs its beauty and warmth. His mother walks into the room but he does not notice her; she calls to him and still he does not move; she picks him up; he rejects her hold. Physically, this child looks healthy and alert; yet, he cannot speak. He seems to live in a world of utter aloneness, absorbed in spinning objects and hours of rocking back and forth. Above all, he withdraws from all social contact. Eventually, the child is taken to a specialist for psychological assessment. He is diagnosed autistic.

What is autism? How is it caused? How can it be treated? It is the writer's intention to define autism as precisely as possible, to outline the different theories that account for this syndrome, and to discuss the varying methods of treatment used. The parent-child rela-

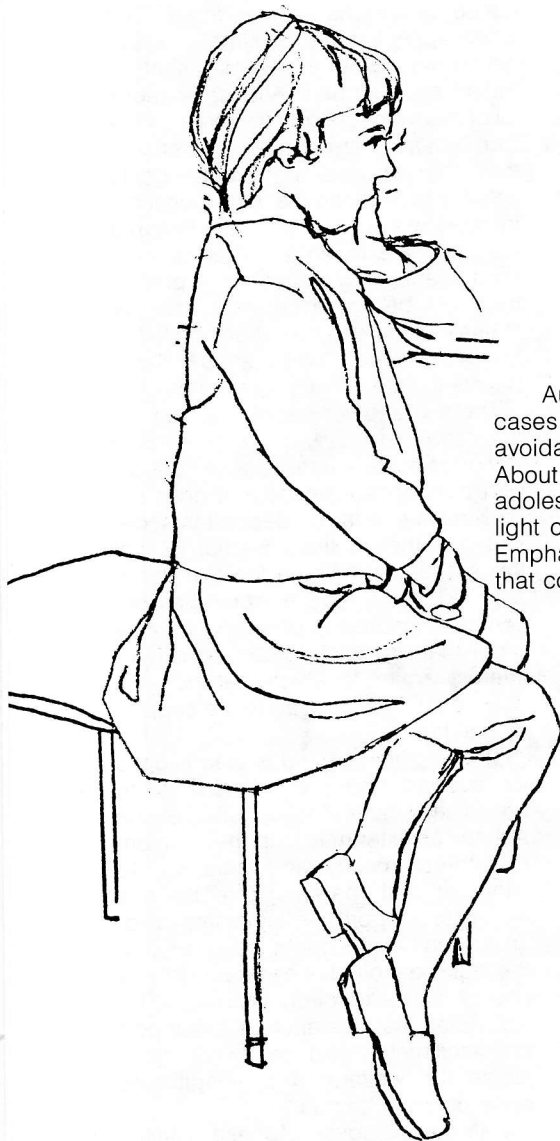
tionship, and the special problems that face the autistic child and his parents within the context of the larger community will also be described.

Description of Autism Characteristics

The word autism is derived from the Greek word "autos", meaning "self". Children are classified as being "autistic" because they appear to be sealed off into a world of their own, devoid of all social contact.

Doctors and parents alike have been troubled and concerned with the special nature of autism for years. Breakthrough research occurred, however, in 1943, when a child psychiatrist, Leo Kanner, identified autism as something separate from childhood schizophrenia. Kanner's observations resulted in a definition of autism based upon the following criteria:

- the child has an appearance of aloofness and distance.



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- normal appearance, alert and expressive.
- normal motor activity; quick skillful movements.
- avoidance of eye contact; visual or auditory response to others lacking.
- no physical reaching out from infancy.
- no imitation of sounds or gestures.
- failure to speak for communication purposes.
- a marked facility with objects.
- cognitive potentialities masked by this disorder.
- an obsessive resistance to change.
- occurs in less than 1% of the general population.

Since his original description of autism Kanner has distinguished "extreme autistic aloneness", and an obsessive desire for the "preservation of sameness" as the primary symptoms of Early Infantile Autism.

In his attempts to differentiate EIA* from childhood schizophrenia, Kanner has suggested that while childhood schizophrenia does not seem to fully emerge until about two years of age, EIA seems to be present immediately at birth. He has also noted that whereas the schizophrenic child exhibits a "withdrawal" from previously formed relationships with his environment, the autistic child displays "from the start an extreme autistic aloneness", and has difficulty in developing relationships (Kanner, 1973).

Although both autistic and schizophrenic children exhibit poor relations with reality and experience distorted body-images, the schizophrenic child manifests this deficit through an extremely distorted fantasy life, delusions, and hallucinations, while the autistic child retires into an inner world and focuses upon stereotypic ritualistic behaviour such as rocking back and forth, slapping, flapping and rolling.

Rimland (1964) also suggests that the autistic child will display, "prolonged rocking and head banging in the crib . . . an unusual fear of strangers, obsessive interest in certain toys or mechanical appliances, highly repetitive and ritualistic play . . . and very unusual language behaviour" (p.7). Toilet training is described to be difficult, and fetishlike feeding problems are a common occurrence.

Although the autistic child may at first be mistakenly regarded as mentally de-

ficient, this has not been proven to be the case. Firstly, these children do not possess the empty, vacuous expressions of the dull-minded; autistic children have an alert, expressive countenance. Secondly, these children excel beyond normal expectations in many areas: they are known to have excellent rote memories, a high level of visuo-spatial ability, superior mechanical and artistic abilities, and astounding musical talents. One child was capable of accurately determining such mathematical calculations as 6427×4234 within a flash; another child was able to disengage appliances and put them back together in perfect order; and still another child was reported to have repeated an aria in a foreign language after only hearing it once.

"Parents of autistic children . . . feel like the victims and not the victimizers!"

Rimland (1978) refers to these child prodigies as "autistic savants". He conducted a survey amongst parents of autistic children and asked them to indicate unusual capabilities that their children possessed. Parents replied enthusiastically and reported that their children at a very early age (1½ - 5 years) exhibited distinct and exceptional abilities such as reproducing drawings with utmost precision and attention to detail; building and balancing extraordinary structures that seemingly defied gravity; singing and playing musical instruments with great dexterity and skill; and writing and speaking in several languages such as French, Spanish, Japanese and Russian (however, still not understanding the meaning of words and still not communicating properly).

Recently, an account was written of a young autistic child, Nadia, who by the age of five was capable of reproducing drawings years after she had originally seen them. She accomplished this with great speed and great skill. It was suggested that she possessed an eidetic memory and a unique talent for reproducing drawings as originally perceived (Selfe, 1977).

These are all very unusual and exceptional abilities for children under the age of five, who possess little if any verbal skills!

Kanner and Lesser (1958) believe

that autistic children do possess normal intelligence but that their cognitive potentials are disguised by the basic disorder. Further, they believe that the Stanford Binet cannot be properly utilized to measure the intelligence of autistic children because the questions cannot be adequately comprehended.

Rutter and Lockyer (1967) found that IQ scores were highly predictive of the autistic child's later functioning in adolescence. Children who were untestable on any IQ test or had an IQ below 60 were issued an unfavourable prognosis. Furthermore, Rutter suggested that those autistic children who are also diagnosed as mentally retarded should be treated accordingly: they should not be expected to understand words and communicate properly when their mental age is far below their chronological age.

Rutter does emphasize, however, that mental deficiency is not necessarily characteristic of autism. He found that between one-quarter and one-third of the autistic children tested produced IQ scores in the normal range, and that the IQ score of the autistic child was significantly dependent on the intellectual function being tested.

Facility with language and speech has proven to be a good indicator of a favourable prognosis for autistic children in later years. Kanner and Eisenberg (1956) found that approximately one-half of the 100 children tested who possessed meaningful speech at the age of five, improved scholastically and socially, while only one-twentieth of the non-speaking group improved in these two areas.

Rimland (1964) noted that autistic children that do speak usually do so in an "empty, high-pitched parrotlike monotone". Also, they do not engage in the usual banter and chatter that is common to the early speech of toddlers. Speech is not necessarily utilized for communication purposes; it is frequently a response to particular stimuli that only the child is aware of. This speech is inundated with "pronomial reversal" — the use of "you" for "I", and "immediate" or "delayed echolalia", a common speech symptom of the autistic child where he habitually repeats phrases upon hearing them, or "stores" them and repeats them at a later date, totally out of context to the natural observer.

For example:

Mother: How old are you Jimmy?

Child: How old are you Jimmy?

*Early Infantile Autism.

Philips and Dyer (1977) believe that "immediate echolalia" is a necessary stage of language development and they suggest that this prevailing symptom amongst autistic children should be encouraged rather than eradicated. They see autistic children as late developers and believe that if their echolalia is accepted and properly reinforced, it will naturally transform to higher levels of language development.

Some researchers think that at the basis of the autistic syndrome is the child's inability to relate new stimuli to remembered experiences.

Condon (1975) proposes that "delayed echolalia" may be due to the autistic child responding to a sound more than once. With his linguistic-kinesis micro-analysis of sound films analyzing human behaviour, he has noticed that autistic children, unlike normal children do not respond immediately to sound. They seem to exhibit a delayed reaction. Condon's underlying premise is that communication is an "interactional synchrony" of "intricate and shared movements" between people. He sees communication as a subtle dance, wherein the body responds in movement to sound. Thus, the autistic child will hear a sound but respond physically and rhythmically to the sound pattern later on. The child, therefore, engages in a "dyssynchronous" dance of communication.

Epidemiology

Infantile autism has been identified in all parts of the world and has been found to occur approximately 4 or 5 times per 10,000 births. There is a pronounced prevalence of male cases with a ratio of 2.75 to 1 for those with a firm diagnosis of autism and 2.4 to 1 for those with autistic-like symptoms (Lotter, 1966). Kanner encountered 80 boys and 20 girls in his initial 100 cases at the John Hopkins Hospital. Keeler (1957) and Anthony (1958) also support this data.

In the past, parents of autistic children were described as highly intellectual, cold and detached. Understandably many parents protested this officious and narrow characterization. They did not want to be held responsible for their children's disorder. From a socio-

economic perspective, Lotter (1967) discovered that families of autistic children came from the upper or upper-middle classes of society.

The most common ordinal position of the autistic child in his family constellation is that of first-born. Kanner (1954), Creak and Ini (1960), Pitfield and Oppenheim (1964) and Rutter (1967) have all found this to be the case.

Theories of Autism

(Nature and Aetiology of the Disorder)

The autistic child presents an enormous challenge to the psychiatric community. Cause remains as much an enigma today as it did a quarter century ago. Theories proposed in effort to explain the aetiology of this rare and mysterious disorder are generally divided into two schools of thought: the psychogenic theories and the biogenetic theories.

Psychogenic theories rest on the following arguments and assumptions: 1) there is lack of consistent data pointing to organic dysfunction; 2) autistic children seem to be predominantly raised in cold, emotionless environments; 3) the manifest behaviour of the autistic child — his indifference, mutism, or aggressiveness is viewed as a reflection of his angry and resentful feelings towards his parents; 4) the high incidence of first-born children seem to indicate a causal connection between parental treatment and autism (Rimland, 1964).

Bettelheim (1967) has done considerable work in the area of autism and he views the aetiology of this disorder from a psychoanalytic standpoint. He describes the autistic child as an "empty fortress" and believes that this child has suffered severe maternal deprivation at a critical period in his development. He also suggests that the parents of the autistic child have prevented him from developing a potent, healthy self-concept, by either stifling his environment, or by somehow expecting too much from him too early. Thus the child tends to feel impotent in his environment, and rejects the world.

Bettelheim considers the autistic behaviours to be external symptoms rooted in an internal, emotional disorder. He believes that these symptoms can be reached and cured through psychoanalytic techniques. His "milieu therapy" requires the child to spend several years engaged in the intimate relationships with parent surrogates in a permissive environment. Techniques such as catharsis, interpretation, play

therapy and body contact are employed.

Kanner and Eisenberg (1956) have also suggested that the cold, obsessive, and detached manner of the parents have harmfully contributed to the autistic child's disorder. Contrary to this position, but still psychodynamically oriented, Green and Schecter (1957) have proposed that EIA stems from too much intrusion on the part of the mother, rather than too little. They argue that the child's normal need for "investigation, communication, and contact with the outer world" is stifled by the intrusive mother.

Garcia and Sarvis (1964) worked with over 100 autistic children and came to the conclusion that autism is "a reaction to an overwhelming inner or outer assault at a vulnerable developmental stage".

Parents of autistic children have adamantly taken offence to the psychodynamic theories postulated concerning the aetiology of this disorder. They feel as though they stand wrongly accused of a situation wherein they, themselves, feel like the victims and not the victimizers! It is they who feel helpless, and vulnerable and generally intruded upon by an aggressively disturbed child.

"Autistic children demonstrate a preference for music over verbal stimuli, and predominantly use the left ear to listen to both types of material"

Many theorists have also found psychogenesis to be an inadequate response concerning the aetiology of autism and they have proposed biogenetic causation instead. Biogenetic theories rest upon the following considerations: 1) many autistic children are born of parents that do not conform to the "cold, detached, emotionless" personality profile; conversely there are many parents who do fit this description and have children that are clearly not autistic; 2) siblings of autistic children are predominantly normal; 3) EIA children manifest unusual behaviour "from the moment of birth"; 4) there is a constant sex ratio of three or four boys to one girl; 5) virtually all cases of twins reported in the literature have been

identical with both twins afflicted; 6) autistic symptoms are highly specific and unique (Rimland, 1964).

Twins studies are frequently employed to indicate hereditary influence in the aetiology of a disorder. Folstein and Rutter (1977), in a concentrated study on 21 pairs of same sexed twins discovered that in the monozygotic pairs 82% were concordant for cognitive disorders or autism compared to only 10% concordancy for the dizygotic pairs. According to Folstein and Rutter this would suggest that some sort of cognitive abnormality is inherited. They have also found that a 2% rate of autism exists in siblings which is 50 times greater than that of the normal population and that speech delay occurs in one-quarter of the families. This would support their notion of a hereditary base for Early Infantile Autism.

Both Anthony (1958) and Ornitz and Ritvo (1968) suggest the possibility of a defective perceptual apparatus as the cause of autism. Ornitz and Ritvo (1968) claim that EIA is manifested by a breakdown of homeostatic regulation of sensory input, involving disturbances of motility and perception. Their neurophysiological studies suggest a failure of the normal homeostatic balance between excitatory and inhibitory influences within the central nervous system resulting in a faulty modulation of motor output, and sensory input.

Rimland (1964) has elaborated an aetiological theory of EIA that pertains to "cognitive dysfunction" of the brain. He feels that at the basis of the autistic syndrome is the child's inability to relate new stimuli to remembered experiences. Consequently, the child cannot properly formulate symbols, analogies and abstractions; he cannot integrate his sensations and perceptions into "comprehensible wholes". Therefore, the autistic child, is generally disinterested and unresponsive to environmental stimuli. Rimland believes that the child's affective disorder is secondary to his cognitive impairment.

Schopler (1965) believed that disturbed usage of sensory receptors was the cause of EIA. He felt that autistic children deviated in their use of "near" and "distance" receptors. They tended to prefer "near" receptors such as touch, smell, and taste, while ignoring "distance" receptors such as vision and audition. Schopler proposed that a defective reticular arousal system was the cause of this disuse of "distance" receptors to deal with the environment,

and he felt that this abnormality was accentuated by mothering that tended towards understimulation.

Hermelin and O'Connor (1970) concentrated on the sensory impairment and language deficits of autistic children. They investigated coding and immediate recall in autistic, subnormal and normal children, and found that autistic children were more likely to remember the last part of a message, making their verbal recall relatively independent of meaning expressed. They attributed autistic behaviour to input distortion. Autistic children tended to recall structured and patterned material as if it were random; yet, the sequences they produced were not random at all, but followed explicit rules such as "repetition" or "alternation".

Cerebral dominance in autistic children has been investigated as a possible indicator of brain damage. In one study conducted by Colby and Parkison (1977) it was discovered that in a group of 20 autistic children and 25 normal children, 65% of the autistic children were left-handed, whereas only 12% of the normal group were left-handed. These results seem to indicate an inability on the part of autistic children to establish left-hemisphere dominance. Colby and Parkison further suggest that this phenomenon might explain the defective language development so common among autistic children.

Blackstock (1978), in an experiment with autistic and normal children discovered that autistic children demonstrated a preference for music over verbal stimuli, and predominantly used the left ear to listen to both types of material. Again, this would support the notion that many autistic children are predominantly right-hemisphere dominant.

Stella Chess (1977) speculates that autism is a result of brain damage and demonstrates a significant correlation between congenital rubella and autism. She claims that a viral invasion of the central nervous system may be the cause of this disorder.

Biochemical or physiological theories imply that a specific biochemical imbalance or structural defect is responsible for autistic symptoms. Kety (1959) has suggested that autistic children are suffering from a serotonin deficiency arising from metabolic failure.

Some physiological theories suggest that autism is not caused by a specific

biochemical imbalance or neurological deficit, but rather is a secondary reaction to such deficits. Bender (1960) for example, maintains that autism enables the child to protect himself from the anxiety and disorganization arising from a basic genetic and structural pathology. Goldstein (1959) also views autism as a defence against the child's inability to cope with unbearable anxiety.

"Some people have achieved favourable treatment results by simply following the child into his world."

Pharmacological treatment has worked with some success on autistic children, which further suggests that the aetiology of EIA may be rooted in biochemical imbalance. Resperine, triiodothyromine, and iproniazid, have demonstrated some success in alleviating autistic symptoms, while deanol seems to have produced the greatest success (Rimland, 1964).

Recently Rimland (1978) has advocated the use of mega-doses of vitamin B-15 suggesting that its anti-allergenic qualities may act as an effective antidote to an allergy that could be striking the central nervous systems of autistic children.

Biogenetic theories have some troubling aspects. Firstly, little can be done to undo the influence of genetic factors, and secondly, from a therapeutic standpoint, the genetic causal factor may be very distant from the manifest behaviour at hand.

This is where learning theorists enter the picture. Ferster (1961) and Lovaas (1965) have proposed that the autistic child's maladaptive behaviour is due to faulty conditioning. They believe that the only differences between the normal child and the autistic child are behavioural in nature. Therefore, they believe that the achievement of normal behaviours can be instituted with the development of a proper and specific behaviour modification program.

Treatment

Feelings of disillusionment and hopelessness pervade the evaluations of varying treatments of autism. One reads such statements as "psychotherapy in general seems to be of little avail" (Kanner and Eisenberg, 1956), and "no form of psychiatric treatment has been known to alter the

course of autism" (Rimland, 1964). Again, Eisenberg, "there was little or no reason to believe that any of the techniques employed to that date, including psychotherapy, electrical and chemical shock, have been shown to have any effects on the patients treated".

Depending on the aetiological theory that one embraces, different treatments have evolved. An overview of the varying treatments used up to date will be briefly presented here. Emphasis will be placed on those treatments advocating a warm and supportive environment for the autistic child.

An approach that has demonstrated partial effectiveness in creating human responsiveness in cases of EIA involves the presence of a warm, responsive, flexible human being. Studies conducted by Polan and Spencer (1959); Schopler (1962), and Waal (1955) report significant behavioural changes and increased responsiveness to people following play therapy techniques with a warm, responsive therapist. Schopler (1962) felt that autistic children had poor body images and emphasized stimulation gained through physical interaction with the environment in his treatment techniques. Waal (1955) emphasized "acceptance, empathy, anxiety-reducing fondling, and soothing", and this later progressed to bodily stimulation and manipulation.

Bettelheim's treatment approach also stressed warm human contact, but he allowed complete freedom of the child's behaviour to be expressed, while other treatment orientations mentioned thus far, set limits and reality boundaries.

DesLauriers and Carlson (1967) regard the autistic child as a child that is "asleep", due to sensory and affective deprivation. They feel that he can be roused or awakened by a clinical setting that includes a well-defined physical space with a few distractions and a therapist that is warm and spontaneous in nature. They focus on the emergence of the "human structure" (ego-personality) in the child. DesLauriers and Carlson also stress parental interaction in the treatment process and teach parents how to furnish a home environment with high affective arousal.

At the Clarke Institute in Toronto, a warm, and structured atmosphere has been established for the purpose of teaching autistic children speech. Dr. Mary Konstantareas claims that autistic children are more visually than auditory inclined and has, therefore, designed

an intensive speech program which involves autistic children learning to speak and sign simultaneously for purposes of communication. This program has proven to be effective as most children have acquired at least 20 signs and some have acquired 50 (Kohl, 1979).

Learning theorists have proposed that each symptom developed by an autistic child is controlled by a learned habit pattern. Therefore, they place emphasis on inhibiting maladaptive behaviour and encouraging normal behaviour through operant conditioning techniques.

Risley and Wolfe (1967) successfully trained 12 echolalic children to talk functionally using operant conditioning procedures. They also taught parents of an autistic child how to teach their child to work puzzles, and name objects, and how to stop the child's shrieking and crying through a process of conditioning techniques in the home environment.

Ivar Lovaas (1967) in his work with autistic children has emphasized their bizarre self-mutilating behaviour. This self-destructive behaviour includes scratching, pinching, biting off pieces of one's own flesh, and bumping one's head against a hard surface until blood comes forth. Lovaas, in his determination to eradicate such behaviour found that aversive operant conditioning techniques such as electric shock, spanking and shouting worked successfully.

Lovaas believes that autistic children engage in self-mutilating behaviour to procure attention, and he has found that the rate of self-destructive behaviour decreases significantly when these behaviours are punished. He believes that the behaviour modification approach has several advantages: it can be taught to non-professionals; parents become therapists and treatments can be instituted and continued in the home environment; its effectiveness can be measured by objective data rather than subjective impressions and it does not require any knowledge concerning the aetiology of autism.

Thus far, the writer has not been able to find conclusive data in the literature supporting any one method of treatment over the other. Howard Gardner (1978) has noted that although learning theorists and psychodynamic theorists differ greatly in their approaches to EIA, they both advocate the provision of a highly structured environment staffed

with a group of very committed people for the treatment of the autistic child.

One such group of very committed people are those that operate Kerry's Place, a residential treatment centre for autistic adolescents (12-18 years), on a farm near Collingwood, Ontario. Kerry's Place is known for its 108 acres of lush garden and farmland, and its menagerie of barnyard animals including pigs, cows, sheep, chickens and rabbits. Aside from learning speech, the children partake in innumerable meaningful activities ranging from physical exercise, and grooming; to barnyard chores. According to the staff and adolescents this therapeutic farm community has turned out to be a very successful venture. There seems to be a great need for this kind of community treatment approach.

Parent-Child Relationships

It has been emphasized by some workers in the field that the parent-infant bond is a very important one, not to be lightly dismissed.

Brazelton (1976) in her research with mother-infant dyads emphasized the "mutual reciprocity" occurring between mother and child. She encouraged the mother to regard the infant as an active participant in the relationship capable of expressing his particular needs and desires. Although she observed that the human neonate functioned motorically on a primitive level, she stressed that his sensory system was astonishingly sophisticated and he was thus, quite capable of transmitting messages to mother.

Condon (1975) in his studies on human behaviour and communication has also noticed that the human neonate moves "synchronously and rhythmically" with the mother's speech. He points out that these rhythmic responses provide the mother with important feedback concerning the infant's overall state of well-being.



The mother of the autistic child, however, experiences serious difficulty when trying to interact with her child. He does not attend to her speech. He hardly seems to respond at all. As a result the mother ends up feeling frustrated and depressed and often reacts by withdrawing from the child in the same way that he has formerly withdrawn from her. Needless to say this is a most unhappy and painful experience for both mother and child. They are not "in synch" with one another!

Helen Clancy of Australia, seems to have achieved some success with autistic children by attempting to restore the mother-infant bond. She works towards increasing maternal behavioural responses in the mother and utilizes operant conditioning techniques to accomplish this. Apparently, her approach has been very effective.

The autistic child engages in self-stimulatory and self-mutilating behaviour. These are his silent cries of anguish. He seems to reside in a bubble of detachment. How can we reach inside and break his protective bubble? How can we assuage the loneliness and suffering of the autistic child? (This is, of course, assuming that he is indeed lonely and suffering.)

Although the controversy still exists as to the aetiology and treatment of autism, some people have achieved favourable results by simply following the child into his world. They have been sensitive to the child's needs and messages and have encouraged him to be the director of his own development. The Kaufmans are a case in point. In their book entitled *Son-Rise* they report spending painstaking hours with their child, Raun, exploring his world and gently nudging him into their own. By the time their son is 2½ years old he is assessed by their doctor to be a normally functioning child.

Nikolaas Tinbergen (1974) in his "watch and wonder" approach to stress disease also encourages going into the child's world. He has discovered through his naturalistic observation of animals in the wild that a lot can be learned from simple, keen observation. Observing children in general, he noticed that normal children also display autistic behaviour in certain situations. He especially focused on the autistic symptom of gaze-aversion.

He noticed that these children exhibited autistic behaviour when confronted with two conflicting alternatives:

on the one hand a situation evoked fear and the child wished to withdraw; on the other hand, the child was stimulated and desired to explore the new situation. Certain children, those characterized by shyness and inhibition tended to freeze in such situations. Tinbergen discovered that by deliberately entering the child's world, following his pace, and speaking his own language, one could attain astonishing results.

"The autistic child retires into an inner world and focuses upon stereotypic ritualistic behaviour."

How do Autistic Children Feel?

Since autistic children experience difficulty communicating, there are few first-hand reports in the literature describing their feelings. The following reports, however, recalled retrospectively, are examples of how the autistic child feels in his condition:

"As an autistic child, I felt very uncomfortable. The hardest thing to accept was not being able to talk . . . or communicate to anyone . . . Fear was my biggest problem. It was a terrible feeling . . . It was very hard for me to communicate so I screamed a lot because it helped my frustration and cleared the air".

(W.J. Donovan Jr., 1970)

"I've had to go through a lot of pain. All this trouble just to be normal. I did not like myself as a child. When I was young, I would look down at myself and then up at all the other people around me. I felt different . . . I'd think that the rest of the world was a chain of people and that I was a separate link".

(Quote taken from an 18 year old girl, Kohl, 1979)

How do the Parents Feel?

Feelings of despair and disillusionment pervade the households of autistic children. Normal family functions are brought to a halt as the family attempts to deal with the confusing world of the autistic child. Parents feel helpless and vulnerable in a situation where they are frequently blamed for their child's disorder. Normal family pressures accelerate and the family must be prepared to meet with a larger community that does not necessarily accept or understand the special problems that con-

front the autistic child. The family itself is faced with an overwhelming challenge: it must learn how to creatively nurture and structure the chaotic world of a disturbed child. To further add to the parents' problems, the psychiatric community often places them in a double-bind: if the child is diagnosed as autistic, then he is considered untreatable, but if his symptoms do improve in therapy, then he was not autistic to begin with.

Parents want their children to achieve their full potential as human beings even if it is below the optimal level of normal children. They want their sons and daughters to pursue meaningful activity where they can feel useful to themselves as well as society.

The following letter reveals the initial feelings of an autistic parent:

"Help! . . . Our home has been hijacked!

This tiny person has us all at "gunpoint". He is demanding and we cannot even understand his demands. He is obviously desperate, he is disturbed, erratic and often incoherent. We feel anxious, outraged and frightened at this unexpected turn of events. This situation occurred with such suddenness that we lacked any specific preparation to be hostages. We had expected to be simply "parents".

Signed, Hostage Parents
of an Autistic Child. (Torisky, 1978)

And now for a different perspective:

"Our plunge into his world had had a dramatic impact on us — it was like exploring a new frontier, the deep probing and discovering of a human being. Through our lovely and serene little boy we had been reawakened to the complexities of perceiving and thinking . . . We were beginning to come to grips with his world . . . without fear and anxiety, but with love and acceptance and permissiveness.

(Kaufman, 1976)

Conclusion

Autism is a severe disorder requiring serious attention. Theorists are still not able to define the aetiology of autism and although various treatment techniques have been applied, the prognosis of the autistic adolescent or adult still remains unfavourable. There are isolated communities of autistic people living together but it is rare that an autistic individual is able to mingle adaptively with the rest of society.

It is the writer's belief that more communities stressing **meaningful** activity for autistic children and more treatment centres emphasizing parent involvement should be established. The environment should be encouraging, warm and nurturing in nature. Perhaps, then the "empty fortress" can be filled.

In conclusion, and in commemoration of the International Year of the Child, it is my hope that the distinctive nature of the autistic child has been conveyed to the reader. The autistic child is indeed a special child! ●

REFERENCES

- Anthony, J. An experimental approach to the psychopathology of childhood. *Brit. J. Med. Psychology*, 1958, 31, 211-255.
- Bender, L. Autism in children with mental deficiencies. *American Journal of Mental Deficiencies*, 1960, 63, 81-86.
- Bettelheim, B. *The Empty Fortress*, New York: Free Press, 1967.
- Blackstock, E.G. Cerebral asymmetry and the development of early infantile autism. *Journal of Autism and Childhood Schizophrenia*, 8 (3), 1978, 339-353.
- Brazelton, T.B. Early parent-infant reciprocity. *The Family — Can it be Saved?*, Chicago: Year Book Medical Publishers, Inc., 1976.
- Chess, S. Follow-up on autism and congenital rubella. *Journal of Autism and Childhood Schizophrenia*, 1977, 7, 69-81.
- Colby, K.M. and C. Parkison. Handedness in autistic children. *Journal of Autism and Childhood Schizophrenia*, 1977, 7(1) 3-9.
- Condon, W. Multiple response to sound in dysfunctional children. *Journal of Autism and Childhood Schizophrenia*, 1975, 5(1), 37-55.
- Creak, M. and S. Ini. Families of psychotic children. *Journal of Child Psychology and Psychiatry*, 1960, 1, 156-175.
- DesLauriers, A.M. and C.F. Carlson. *Your Child is Asleep*. The Dorsey Press: Illinois, 1969.
- Donovan, W.J. My experiences as an autistic child. *Proceedings*. National Society for Autistic Children, 99-103.
- Eisenberg, L. The autistic child in adolescence. *American Journal of Psychiatry*, 1956, 112, 607-612.
- Ferster, C.B. Positive reinforcement and behavioural deficits of autistic children. *Child Development*, 1961, 32, 437-546.
- Folstein, S. and M. Rutter. Genetic influences and infantile autism. *Nature*, 1977, 265 (5596), 726-728.
- Garcia, B. and M.A. Sarvis. Evaluation and treatment planning for autistic children. *Archives of General Psychiatry*, 1964, 10.
- Gardner, H. Interlude: Another perspective on human development, in *Developmental Psychology, An Introduction*, New York: Little Brown, 1978.
- Goldstein, K. Abnormal conditions in infancy. *Journal of Nervous and Mental Diseases*, 1959, 128, 533-557.
- Green, M.R. and D.E. Schechter. Autism and symbiotic disorders in three blind children. *Psychiatric Quarterly*, 1957, 31, 628-646.
- Hermelin, B. and N. O'Connor. *Psychological Experiments with Autistic Children*, Oxford: Pergamon Press, 1970.
- Kanner, L. Autistic disturbances of affective contact. *Nervous Child*, 1943, 2, 217-250.
- Kanner, L. To what extent is early infantile autism determined by constitutional inadequacies? *Proc. Ass. Res. Nervous and Mental Diseases*, 1954, 33, 378-385.
- Kanner, L. and L. Eisenberg. Notes on the follow-up studies of autistic children. In *Psychopathology of Childhood* (Ed. by Hoch. P.H. and Zubin, J.) New York: Grune and Stratton, 1956.
- Kanner, L. and L.I. Lesser. Early infantile autism. *Pediatric Clinics of North America*, 1958, 5(3), 711-730.
- Kaufman, B.N. *Son-Rise*, New York: Warner Books, 1976.
- Keeler, N.R. In discussion *Psychiatric Reports of American Psychiatric Assoc.* 1957, 7, 68-88.
- Kety, S.S. Biochemical theories of schizophrenia. *Science*, 1959, 129, 1528-1532, 1590-1596.
- Kohl, H. The strange ones. *The Canadian Magazine*, 1979, April, 10-14.
- Lotter, V. Epidemiology of autistic conditions in young children. *Social Psychiatry*, 1966, 1(3), 124-137.
- Lovaas, I. A behaviour therapy approach to the treatment of childhood schizophrenia. *Minnesota Symposium on Child Psychology*, University of Minnesota Press (In Press), 1967.
- Ornitz, E.M. and E.R. Ritvo. Neurophysiologic mechanisms underlying perceptual inconstancy in autistic and schizophrenic children. *Archives of General Psychiatry*, 1968, 19, 22-26.
- Phillips, G.M. and C. Dyer. Late onset of echolalia in autism and allied disorders. *British Journal of Disorders and Communication*, 1977, 12(1), 47-59.
- Pitfield, M.V. and A.N. Oppenheim. Child rearing attitudes of mothers of psychotic children. *Journal of Child Psychology and Psychiatry*, 1964, 5, 51.
- Polan, C.C. and B.L. Spencer. Check list of symptoms of autism in early life. *West Virginia Medical Journal*, 1959, 55, 198-204.
- Rimland, B. *Infantile Autism*. New York: Appleton-Century-Crofts, 1964.
- Rimland, B. Inside the mind of the autistic savant. *Psychology Today*, 1978, August, 69-80.
- Risley, T. and M. Wolfe. Establishing functional speech in echolalic children. *Behaviour Research and Therapy*, 1967, 5.
- Rutter, M. Psychotic disorders in early childhood. In *Recent Development in Schizophrenia: A Symposium* (Ed. by Coppen, A.J. and Walk, A.), London: R.M.P.A., 1967.
- Rutter, M. and L. Lockyer. A five to fifteen year follow-up study of infantile psychosis I - description of sample. *British Journal of Psychiatry*, 1967, 113, 1169-1182.
- Schopler, E. The development of body image and symbol formation through bodily contact with an autistic child. *Journal of Child Psychology and Psychiatry*, 1962, 3, 191-202.
- Schopler, E. Early infantile autism and receptor processes. *Archives of General Psychiatry*, 1965, 13, 327-335.
- Tinbergen, N. Ethology and stress disease. *Science*, 1974, 185, 20-26.
- Torisky, C. The hostage parent: a life-style or a challenge? *Journal of Autism and Childhood Schizophrenia*, 1978, 8(2), 234-240.
- Waal, N.A. A special technique of psychotherapy with an autistic child. In G. Caplan (ed.), *Emotional Problems of Early Childhood*. New York: Basic Books, 1955.

Native Child (Continued from page 173)

provincial courts cannot themselves remove or affect an Indian's interest in reserve land. In other words, under the *Indian Act*, the marital home, if it is on a reserve, may be invulnerable to a court order enforcing a divorce settlement, with the result that spouse and dependants may have to live in crowded circumstances with relatives. Any transfer of that interest must be to a band member and have the approval of the Department. There are various *ad hoc* legal arrangements for ensuring that a transfer necessary to maintenance does occur. But, as Douglas

Sanders pointed out in his paper for the Law Reform Commission of Canada, these are "no substitute for a regime of marital property."

There can be little doubt that the recognition of a regime of marital property in the *Indian Act* would ease the hardships faced by many status Indian children after a marriage breakdown. Thus, the removal of all distinctions between legitimate and illegitimate children in the maintenance provisions of the *Indian Act*, along with special provisions for native people and related amendments in provincial and territorial legislation would certainly ameliorate the lot of native children.

But, ultimately, given the poverty of the native population in Canada, the effectiveness of even the best children's maintenance legislation as a source of economic support for the native child is questionable. Parents living far below the poverty line, often with no income, cannot be compelled to support their children with what they do not have. This issue then becomes more one of protection than maintenance. ●

The needs of the native child for protection, for health care and for education may be found in the remaining part of Chapter 6, *Admittance Restricted: The Child as Citizen in Canada*.

Situation de la Garde de Jour au Canada

Un Résumé des Principales Constatations sur la Garde de Jour en 1978

Les développements majeurs qu'ont connus les services offrant des programmes de garde de jour complète et des programmes pour le midi et après l'école, tels qu'ils ressortent des données recueillies aux fins de la présente étude.

- Le nombre de places dans les garderies a légèrement augmenté de 1977 à 1978, passant de 81 651 à 82 279, soit un gain de 628 places ou de 0.77%.
- Cette augmentation est attribuable au taux de croissance remarquable qu'ont connu les services de garde en milieu familial, où le nombre de places est passé de 5534 en 1977 à 7763 en 1978, soit une augmentation de 2229 places ou de 40.28%.
- Le nombre de places dans les garderies a diminué en 1978 de 1601 par rapport à 1977 et de 3637 par rapport à 1976.
- Si l'on ne tient pas compte de programmes pour le midi et après l'école dans les garderies, on constate que le nombre de places pour les enfants d'âge préscolaire a baissé de 2072 par rapport à 1977 et de 4069 par rapport à 1976.
- Les garderies à but lucratif accusent une modeste hausse du nombre de places mais les garderies dirigées par un conseil représentant la collectivité et les coopératives dirigées par les parents en ont perdu 3239.
- Cette baisse importante du nombre de places dans les garderies, qui survient pour la deuxième année consécutive, est alarmante et montre que l'avenir des garderies au Canada, en particulier celles à vocation communautaire et sans but lucratif, est menacé.
 - 5.73% des enfants de moins de 2 ans, dont la mère travaille, sont inscrits dans des garderies.
 - 12.65% des enfants de 2 à 6 ans, dont la mère travaille, sont inscrits dans des garderies.
 - 0.39% des enfants de 6 ans et plus, mais de moins de 15 ans, dont la mère travaille, sont inscrits dans des garderies.

Les recherches sur le terrain semblent indiquer que la situation de la garde de jour en 1979 demeurera sensiblement la même qu'en 1978.

Situation de la Garde de Jour au Canada
Santé et Bien-être social Canada, 1978.

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Status of Day Care in Canada

A Summary of the Major Findings of the National Day Care Study 1978

These are the major developments in day care services offering full day care and lunch and after school programs as reflected in this survey.

- The number of day care spaces increased slightly from 81,651 in 1977 to 82,279 in 1978 — a gain of 628 or .77%.
- The growth in spaces is attributed to the remarkable rate of growth of family day care 5534 in 1977 to 7763 in 1978 — an increase of 2229 or 40.28%.
- The number of spaces in day care centres in 1978 has decreased by 1601 spaces since 1977 and 3637 spaces since 1976.
- When the lunch and after school spaces within the day care centres are not included, the number of centre spaces for preschool children have declined by 2072 from 1977 and 4069 from 1976.
- Commercial centres experienced a modest increase in spaces but the community board operated and parent cooperative centres decreased by 3239 spaces.
- The significant drop in centre spaces for the second year in a row is alarming and indicates that the future of day care centres in Canada, especially in the community based, non-profit sector, is being jeopardized.
 - 5.73% of children under the age of 2 of working mothers are enrolled in day care.
 - 12.65% of children aged 2 - 6 of working mothers are enrolled in day care.
 - .39% of children 6 and over, but under 15 years of age, of working mothers are enrolled in day care.

Field observations suggest that the status of day care in 1979 will remain substantially unchanged over 1978.

Status of Day Care in Canada
National Health and Welfare, 1978.

Letter to the Editor

Just a note to say that I am so pleased with the new format of the *CHE Journal*. I had thought of discontinuing my membership with the Association but after reading every word, even the advertisements in the spring issue, I became enthused all over again. Now I am awaiting with interest the arrival of the next issues.

Enjoyed the picture of Winnie Bracher. I haven't seen her since 1950.

Yours sincerely,
Judy H. Buchanan
Winnipeg, Manitoba

The deadline for material to be submitted for the next issue of the *CHE Journal* is November 1, 1979.

Dental Decay in Infants: "Nursing Bottle Syndrome"

Nina E. Burgess, B.Sc. (H.Ec.), M.Ed.

This article is a plea to home economists, dietitians, nutritionists, nurses, family physicians and parents to be concerned with the effect of early feeding habits on young children's dental health. One of the most tragic diseases observed by dentists is a condition of rampant tooth decay associated with the misuse of the nursing bottle. Paedodontist, Dr. David Kenny at the Children's Hospital of Eastern Ontario is dismayed at the number of children he treats for rampant decay — many of them under three years of age. This unfortunate occurrence is repeated in hospital dental clinics and paedodontic offices all over North America.

The "nursing bottle caries" patient is a child between 1½ and 4 years exhibiting a distinct pattern of dental decay.¹ Typically all the upper anterior teeth and some of the lower molars are decayed.

Such severely decayed teeth require extensive restoration, usually stainless steel crowns, or extraction. When several of the upper anterior teeth are removed, they must be replaced by a partial denture.

The loss of teeth often allows the child to thrust his tongue into the empty space, developing an undesirable habit and a possible speech disorder. Food selection and eating habits are often affected by missing, decayed and poorly aligned teeth. In addition, the psychological and financial costs resulting from this condition are considerable. Predictably these children develop a negative attitude toward their mouths and a long lasting fear of visiting the dentist.

In North America five to ten percent of children have some decay by the age of two years. Since an estimated one percent of bottle fed infants develop "nursing bottle caries",² the syndrome is clearly not associated with bottle feeding per se, but rather with some aberration of the practice. The teeth appear to withstand bottle feeding, even at bedtime, if the procedure is not extended beyond the normal weaning period.² However the combination of protracted bottle feeding, the use of sweetened beverages in the bottle, and prolonged sucking of such fluids over many hours of the day leads to "nursing bottle syndrome".

Dental caries is caused by the fermentation of dietary sugars by bacteria in dental plaque.³ When sugars are ingested, the bacteria partially degrade the sugar, producing acid which promotes demineralization of the tooth. With repeated sugar exposures the cavity gradually forms. Saliva helps protect teeth against the damage of the acid. Meal-eating and active sucking help stimulate the flow of saliva whereas the flow is greatly diminished during sleep. A

child who is put to bed with a nursing bottle falls asleep with the beverage pooled in the mouth and covering the teeth. The child may continue to suck from time to time during sleep, renewing the supply of liquid in the oral cavity. With regular exposure to sugar and diminished saliva flow during sleep, the vulnerable newly-erupted teeth eventually show rampant decay. A beverage sweetened with sugar, syrup, or honey is most frequently the culprit, but milk and unsweetened fruit juice have been reported to be damaging if the child is given a bedtime bottle past the usual weaning age. When glucose or other sugar solutions are given to new babies in hospital or are recommended by pediatricians or family doctors, an undesirable habit is begun and is given credibility by the medical profession. Milk and unsweetened fruit juice are more suitable for the bottle than sweetened beverages. Ideally, milk, juice and other liquids fed by bottle should not be left in the crib while the child is sleeping, but if done the practice should certainly be discontinued by the age of ten months. No liquids, except water, are dentally safe for the bedtime bottle. Sucking a sugar, honey, jam, or corn syrup coated pacifier can also cause the syndrome: the pacifier alone is not harmful. Teething biscuits containing sugar such as Arrowroots and similar "plain" cookies are best avoided and replaced by hard bread crusts, bread sticks or plastic teething rings or toys.⁴

Dental professionals often do not see affected children until the damage has occurred. Therefore, other health professionals who come in contact with pregnant women and mothers of young children are urged to become alerted to the problem and to assist in its prevention. This totally preventable condition could become another children's disease of the past if all babies were off the nursing bottle when they sleep by the age of ten months. As well, parents should make sure that optimal amounts of fluoride are ingested daily either by the use of fluoridated water in formula preparation or by daily use of fluoride drops or a tablet.⁵ Fluorine, like iodine, is a nutrient, now considered by dentists and many nutritionists to be essential in human nutrition, which is incorporated into the enamel molecule making the tooth more resistant to attack by organic acids.⁶ Many paedodontists recommend cleaning of an infant's teeth with a gauze pad, dipped in water, after each feeding.⁷ All children should be examined by a dentist by the age of two years, when most of the deciduous teeth have erupted. •

References

- 1 Kroll, R. and Stone, J. Nocturnal Bottle-Feeding as a Contributory Cause of Rampant Dental Caries in the Infant and Young Child. *J. Dent. Child.* 34:454-459, 1967.
- 2 Powell, D. Milk — Is It Related to Rampant Caries of the Early Primary Dentition? *J. California Dent. Assoc.* Jan. pp. 58-63, 1976.
- 3 Nizel, A.E. The Role of Carbohydrates in the Initiation and Extension of Dental Caries in Nutrition in Preventive Dentistry: Science and Practice. W.B. Saunders, Toronto. pp. 27-49, 1972.
- 4 Truvert, M. Diet Counselling to Prevent Caries. *Ontario Dentist*, Vol. 50, No. 8, pp. 6-11, 1973.
- 5 Nikiforuk, G. Fluoride Supplements for Prophylaxis of Caries. *Ontario Dentist*, Vol. 5, No. 9, pp. 9-12, 1973.
- 6 Nizel, A.E. Fluoride — Its Metabolism, Safety and Role in Prevention and Control of Dental Caries. In *Nutrition in Preventive Dentistry: Science and Practice*. W.B. Saunders, Toronto. pp. 194-218, 1972.
- 7 Moss, S.J. The Paedodontist and the Parent — Paediatric Prevention Pays. *New York Journal of Dent.* Vol. 43, No. 2, pp. 45-47, 1973.

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Writing for Publication: A Note to Contributors

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A commitment to knowledge is an essential part of the home economist's role as a professional. This implies the obligation to keep pace with the current information in one's field of interest; to put that information to best use; and to create new information through carrying out and reporting research.

This last obligation, when not overlooked entirely, seems for many a difficult one to fulfill. This may be due to a system of education which often includes instruction concerning how to read research, and perhaps even an introduction to research techniques, but seldom mentions how to prepare research findings for publication. In fact, the usual way for a person to learn these skills is to accumulate a sufficient number of rejected manuscripts to be able finally to figure out what is expected. As a consequence, many good ideas never are submitted for publication, and others, which might have been accepted if they had been prepared properly, are rejected. The purpose of this article is to suggest briefly, for those who might want to write for publication, a few techniques of manuscript preparation.

First to be considered is the organization of the paper. Although there is no established format as to how an article should be arranged, it is often helpful for the reader if it is divided into several sections, each with a specific purpose. Some of the sections a paper might include are: a statement of the research problem; a description of the methods; presentation of the results; and a conclusion. The following is a short discussion of what each of these sections might involve.

Statement of the Problem

The purpose of research is not simply to report findings, but rather to improve our understanding of the world. As an author, therefore, it is important to show how your work, whether it is some new explanation, technique or test of an existing theory, will contribute to that understanding.

One way this is done is to present the reader with a survey of the existing literature on the topic, then to demonstrate how this is inadequate or what questions it leaves

unanswered, and, finally, to state how your work will go beyond it. This can be done easily by a short, explicit statement such as "The question which this research answers is . . .", or "The purpose of this article is . . .", which introduces the reader to the topic and prepares him for what is to follow.

Methods

After having established the purpose of the research, it is necessary to explain how it was carried out. The objective of the methods section is to make clear to the reader what techniques were used and why they were chosen. Although the specifics to be addressed will depend upon the individual project, those mentioned most often are the research design and the definition and measurement of variables.

Modern science assumes that we can understand the world by observing it. The design of a research project is the way it arranges a series of observations in order to achieve a better understanding of some particular phenomenon. For example, depending upon the question to be answered, the design might involve treating two or more groups of subjects (tests and controls) differently and observing the effect, measuring one group at different points over a span of time, or observing existent differences among two or more groups and explaining them in terms of past occurrences. Whatever the situation, the plan of the project should be described and its choice explained.

Many of the variables with which home economics research is concerned, such as time, weight, size and temperature, can be observed and measured directly. Many others, however, including attitudes and knowledge, cannot. In the latter instance, the variable must be defined in terms of some other thing or operation which can be observed and measured. For example, attitudes are often defined as the response to a set of statements and measured by questionnaire. Because in these cases the conclusions of the research depend upon how well the thing which is measured represents the variable for which it stands, it is important that the decisions concerning the choice of these measures be thoroughly discussed.

Results

Often a research project provides many results, and the author is left unsure of which ones to include and which to leave out. This situation can be avoided if the findings in the report are organized around answering the original question with which the research is concerned. It is not necessary to include everything which was found, but rather only those things which are relevant to the purpose of the study, or provide some additional insight into the problem, such as the discovery of unexpected results.

These should be stated with a minimum of comment. Often simple tables or figures can be used as an aid. If such tables are used, they should be concise and able to stand on their own without further explanation. Their purpose is to reduce the amount which needs to be written, and there is no advantage to including tables which must be described in the text.

Conclusions

Perhaps because of the involvement they have with their own work, and the fact that its consequences are clear to them, many authors end their report with only a brief summary of what was presented before in the paper. In fact, however, the concluding section of an article represents the opportunity to achieve the real objective of research. That is, to explain how the work improves our understanding of the world.

One question an author should attempt to answer in the conclusion to his/her paper is "After all of this, so what?" In doing so, it is legitimate to go beyond the findings themselves

and to speculate on their significance. For example, how do these results support or refute previous work? What new ways of doing things do they suggest? What new areas of research do they imply?

The conclusion also provides the author with a chance to critique his own work. This might include a comment on its shortcomings and how they could influence the findings, or a discussion of other alternative explanations of the results.

Although the content of the article should be an author's primary concern, there are other things to be considered when a manuscript is prepared for submission. One of these is the choice of a journal. Though it is not necessary that the research itself be tailored for a particular publication, you should find out which ones have dealt with questions like yours in the past, and if the readership it reaches is the same as that for which you are writing. Another point is to make sure that your manuscript conforms to the style required by the publication you have chosen. This means that you submit the correct number of copies, and that the footnotes and references meet its demands. It should also be remembered that the submission of a manuscript represents an implicit agreement to publish in that journal if the article is accepted. It is unethical, therefore, to submit the same piece of work to two journals at the same time.

Because the final decision of whether a manuscript is accepted or rejected is made by the editors of a journal, it is impossible to provide recommendations which will apply in every case. Attention to the few brief suggestions given should increase the likelihood of having your efforts rewarded by an acceptance notice.●

The Special Child (Continued from page 165)

We knew so little about the capabilities of our own child but we were much more optimistic than the school. Blaine's neurologist suggested that we take him to the Vancouver Neurological Centre. If only these services were available to every child with learning problems! Blaine was assessed by a psychologist, a physiotherapist, an occupational therapist and a speech therapist. The findings of each were presented at a panel discussion and from these reports a program was set up. With the help of many professionals Blaine was able to attend school in the public school system for a little over three years (in three different schools!) His need for a very structured, individualized program, his emotional instability and his inability to handle teasing made it very difficult for the school system to accommodate him. The only program we could find that seemed to fill Blaine's needs was a residential school for neurologically handicapped children situated on Vancouver Island.

I had occasionally thought of the time when my children would grow up and leave home but I had never considered sending a child to boarding school. The idea of sending our youngest and most vulnerable child away to school horrified us. Through all of Blaine's problems we had remained a close family. The two girls have shown an amazing maturity in their attitude toward their brother. It was such a difficult decision for the family. None of us wanted Blaine to leave home. Our oldest daughter felt we had no right to send her brother away. In the end we agreed that there was no other school for him.

For my husband and me it was the most difficult decision we have ever had to make. Having Blaine away at school has given us a different perspective on his problems. While he is away we miss him greatly. When he is home we are appalled and frightened by some of his violent outbursts and equally upset by his deep feelings of inadequacy.

Despite these problems Blaine has made amazing progress in the three years he has attended this school. He reads well and is continuing to progress in other areas of his school work. He has made friends and has many good relationships with teachers and staff at the school. Unfortunately, it is time to move on. Once again we are looking for a facility which doesn't seem to exist. The school board suggests a school for the mentally retarded. Since Blaine is working above the level of any other child in the school, we feel that this would be the end of his education. The only other classes available to him are in large public high schools. He could handle the work in a special class but it is doubtful whether he could handle the social relationships required.

Although we realize that Blaine is a difficult child to place we feel that he and children like him have the right to be educated to the extent of their capabilities.

Our lives have been enriched by Blaine's presence. For every low point there has been a high point. Every small success has been cause for great celebration. We would like to think that Blaine's celebrations will continue, but this will only happen if he and others like him are understood, accepted, and encouraged by all of us.●

How Not To Write A Prize-Winning Article *

Robert Ferber
Editor, Journal of Consumer Research

At the end of the first annual Consumer Research Award competition, the Journal of Consumer Research published an editorial outlining common errors in papers submitted for competition. Since problems discussed in this editorial are also the ones which tend to surface when papers are reviewed for the Research Section of the CHE Journal, it is reprinted in this issue of the Journal in the hope that it will assist graduate students and faculty members in converting theses and dissertations into publishable articles.

The purpose of the Consumer Research Award is to give recognition to outstanding papers of an interdisciplinary nature, based on recent Ph.D. dissertations and relating to some aspect of consumer micro-behavior. Twenty-five manuscripts were submitted for the competition. The problems with the 23 manuscripts that received no recognition are the following:

Inadequate theory or conceptual framework	9
Inappropriate methods	8
Inadequate analysis of interpretation	9
Poor presentation	9
Inadequate survey design	4
Previous work overlooked	4
No interdisciplinary content	1

Clearly, most manuscripts had more than one deficiency. Less clear, however, is the fact that many of them had several deficiencies under the same heading. Focusing on the four most frequent types of problems illustrates the nature of these limitations.

Inadequate Theory

In terms of theory, the principal difficulties were generally twofold—the lack of any guiding theory or conceptual

framework, and absence of any clear justification for the hypotheses that served as the basis for the study. Frequently, little attempt was made to provide a conceptual or theoretical framework to relate the different variables to a particular form of consumer behavior. In still other instances, hypotheses were presented without justification, or key variables were introduced with little or no explanation.

Another sort of problem that cropped up was failure to define key concepts and variables. Such definitions have to pay attention to two aspects—how the concept fits into the theoretical framework proposed, and how the concept is made operational to ensure the validity of the procedures. All too often one or the other of these definitional aspects were omitted. Some writers assume that if they think they have a clear grasp of a concept, or of how concepts interrelate, it is not necessary to explicate them. Others fail to consider, or provide evidence of, the extent to which a particular operationalization is a valid representation of a concept. The correspondence between concepts and operational measures can be very tricky, as a concept may be multidimensional and an operational measure may go beyond the concept, so that each may be an imperfect representation of the other.

Inappropriate Methods

The principal shortcoming of these papers with regard to methodology was an inadequate bridge between methodology and the theory or the conceptual framework. This shortcoming takes one of two forms, depending on the type of data serving as the base for the empirical analysis. In the case of laboratory experiments, which all too often were based on convenience samples, a common problem was the external validity of the experimental problem, the implicit assumption being that the findings from a laboratory experiment could be generalized to corresponding behavior in the "real" world. In some instances, the behavior required in the laboratory setting was so artificial that no such generalization

* Reprinted from the *Journal of Consumer Research* (1979), Vol. 5, No. 4, pp. 303-305.

was possible anyway. (This is not to rule out the use of convenience samples in laboratory, or other, experiments, but rather to stress the need for evaluating the appropriateness and the limitations of the sample in light of the objectives of the study.)

In fact, both internal and external validity need to be considered in an experiment, their relative importance varying with the nature and purpose of the study. Adequate treatment of these issues was rare.¹

Where cross-sections or time series data served as the basis for analysis, an occasional oversight was the failure to use any form of multivariate analysis. To assume that one particular type of variable influences behavior or purchase intentions without attempting to take into account the interacting influence of other variables increases (or may even decrease) the chance of obtaining significant results; but there is no telling whether these results may not be due to the interaction with other, still more relevant, variables.

A shortcoming that characterized other manuscripts was the use of highly sophisticated techniques of analysis without justification for the appropriateness of the method to the particular problem. When the objective of the dissertation is to demonstrate the applicability of a new technique to a consumer behavior problem, it is especially important to demonstrate the relevance of that technique to the problem at hand. Also, when a highly sophisticated method is chosen over an adequate simpler method, it is incumbent upon the writer to demonstrate the desirability of the more complex method. It is just as inappropriate to pound tacks with a sledge hammer as to break rocks with a tack hammer.

In general, there seemed to be a tendency in most of these papers to give more attention to the more grandiose aspects of research design, and relatively little attention to such details as possible biases in the data collection procedure, the internal validity of an experiment, and even alternative explanations. The research designs themselves seemed to be at times overly ambitious, but frequently incomplete, with a tendency to rationalize a particular set of concepts or methodology.

Inadequate Analysis

A weakness in the analysis and interpretation of the empirical results has been the tendency of researchers to look at their results with rose-colored glasses. In a number of instances, inferences and conclusions drawn in the text were not warranted from the tables or parameter estimates, and were frequently biased in favor of supporting the hypotheses. Another characteristic of so many manuscripts was the tendency to generalize from the results of a limited study to a much broader population, and even to other types of behavior.

Occasionally, the researcher got so carried away with deriving results from a set of analyses that the conclusions bore little relation to the original hypotheses or objectives of the study. No matter how elegant such conclusions may be, if they do not relate to the objectives or hypotheses of the study, they contribute little to the impression of a well-organized and soundly conducted study.

Poor presentation

Probably the most common criticism was poor presentation. The notion that researchers cannot write well is not contradicted by these manuscripts. The reasons are seem-

ingly contradictory. "On the one hand, the authors did not seem to be able to discriminate between what should go into a dissertation and what should go into a journal article. As a result, many of the papers were miniatures of the dissertation, with much the same organization, focusing on a review of all possible relevant work on the subject. Partly for this reason, most papers were too long. Not only did most authors submit manuscripts totaling the maximum length of 50 pages but some attempted to interpret this rule as 50 pages of text, and included additional unnumbered pages of tables, footnotes, and references. They do not seem to be aware that journal editors can count!

In contrast, some researchers presented their ideas as if no previous work had been done on the subject. The inference that the researcher is the first to explore a topic tends to be especially painful to a reviewer who happens to have published material on the topic some years earlier. Both in this respect and with regard to overall length, many researchers seemed to overlook the virtues of the principle of parsimony and of focusing on their own contribution rather than on showing how much they have learned.

The problem of undue conciseness was noted in overly brief explanations of experimental procedures or methodology. Although this is one aspect for which only the researcher can provide the necessary explanation, in far too many instances this was exactly where the writer chose to provide a minimum of information; thus how the study was carried out or how the data were analyzed remained unclear.

Still another problem was a tendency to use esoteric jargon to explain simple concepts. While this may demonstrate that the author has learned some big words, it frequently adds redundancy and makes the manuscript difficult to understand. At times, the size of the words and the length of the sentences appear to have been substituted for clarity of thought and for the soundness of the theoretical framework and analytical methods. Unfortunately, this rarely works.

A Prescription for Future Entrants

From this examination, some guidelines can be drawn that may enhance the chances of future entrants in this competition, namely:

- Make clear the objective(s) of the study and how they relate to previous studies of this type.
- Provide a sound theoretical or conceptual framework that leads to a set of testable hypotheses.
- Use an analytical method that will test these hypotheses, taking into account other variables that may be relevant to this type of behavior.
- If the focus is on the exposition of a new analytical method, demonstrate its relevance to the problem and include tests to demonstrate its effectiveness against established, reasonable alternatives.
- Take an objective approach in analyzing the results of any empirical tests, and do not generalize beyond the limits of the data.
- Organize the manuscript as an article, not as a little dissertation: be concise, and don't use fancy language when simple words are enough.

These guidelines may not guarantee an award winning paper, but they should make the manuscript a more serious contender, whether it is submitted for the Consumer Research Award or for any other purpose. •

A Case for Home Canning Education

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ABSTRACT

The literature on the frequency of home canning, improper canning practices by consumers, spoilage problems with canned products and cases of illness associated with canned food is reviewed. One third of households participating in a home garden survey canned fruits and vegetables (Davis, 1976). Consumers can foods which are not recommended and use methods which are not recommended (Davis, 1976; McDaniel et al., 1979; Bristol et al. 1965; Fields, Zamora and Bradsher, 1977). Use of non recommended methods results in spoilage of the canned food and consumer illness (Todd, 1977; Todd, 1976; Dolman, 1974). Precautions for preservation of safe home canned foods are outlined. A need still exists for consumer home canning education.

ABSTRAIRE

Une revue de littérature sur la fréquence de la mise en conserve domestique, les pratiques inadéquates, la détérioration des produits mis en conserve et les cas de maladie associés aux aliments en conserve, est incluse. Dans le tiers de foyers participant à une enquête sur les jardins-potager, on faisait la mise en conserve de fruits et légumes (Davis, 1976). Les consommateurs mettent en conserve des aliments non recommandés et utilisent des méthodes non recommandées (Davis, 1976; McDaniel et al., 1979; Bristol et al., 1965; Fields, Zamora et Bradsher, 1977). L'emploi de méthodes non recommandées résulte en la détérioration de l'aliment mis en conserve et en maladies chez les consommateurs (Todd, 1977; Todd, 1976; Dolman, 1974). Les précautions à prendre pour conserver les aliments mis en conserve de façon sécuritaire, sont indiquées. Les consommateurs ont encore besoin d'être renseignés sur la mise en conserve domestique.

Introduction

Incorrect canning techniques often result in spoilage. Spoilage means wasted time, energy and produce for the consumer. Improperly canned foods whether accompanied by obvious spoilage or not, may also cause serious food-borne illness.

If recommended methods are followed, the risks of home canning are eliminated. A review of recent surveys of home canning practices (Davis, 1976; Bristol, et al., 1965; Fields, Zamora, and Bradsher, 1977), reports of spoiled canned food (Davis, 1976; Fields et al., 1977), and incidents of illness associated with home canned foods (Todd, 1976; Todd, 1977; Dolman, 1974) have shown that there is a lack of knowledge and appreciation among consumers of the importance of sound canning methods.

Consumer canning practices, a review of basic spoilage problems and reported cases of food-borne illness are presented. The purpose of this paper is to provide evidence for the need to continue consumer home canning education.

Frequency of Home Canning Practices

Canning is often used as a home preservation method. A nationwide home gardening survey in the United States showed that, in 1975, one third of the households canned fruits and vegetables (Davis, 1976). A study in Washington State reported that 69.7% of households canned foods at home (Bristol et al., 1965). Zottola (1978) at the University of Minnesota reported an increase in distribution of canning publications from 4,000 to 40,000 between the years 1964 and 1975.

Surveys on the incidence of canning are not available for Canada, but distribution of information by the Food Advisory Division of Agriculture Canada has been widespread. In 1973, total distribution (English and French) of the publication **Canning Canadian Fruits and Vegetables** (Agriculture Canada, 1976) was 28,000. In 1976, after a major revision, its distribution was 71,000. Last year 54,000 consumers received copies.

The canning process, if practiced improperly, removes competitive organisms and can provide excellent growth conditions for *Clostridium botulinum*.

The acidity of the food initially determines the process method and therefore the process temperature. High acid foods, those foods with pH values below 4.6, can be safely processed in a boiling water bath. Processing acid foods in a boiling water bath does not destroy *C. botulinum* spores, but acid foods do not support the growth of *C. botulinum* unless other organisms are present. The process does destroy molds, yeast and many bacteria whose growth could raise the pH of the food in the jar to the point where *C. botulinum* could grow. Low acid foods, those foods with pH values above 4.6, require processing in a pressure canner since their lack of acidity means that growth and toxin production by *C. botulinum* is possible. Low acid foods must be processed at 240°F, 10 pounds pressure (115.5°C, 70 kPa) or above for specific lengths of time for the spores of *C. botulinum* to be destroyed.

While the acidity of the food determines the method and temperature of processing, only research on the heat penetration of particular foods can determine the length of the process time. The holding time at the process temperature must be sufficient to destroy all organisms that are present.

Thus a safe process is one that combines the right method and temperature for the correct length of time. Mistakes in technique made by the home canner can, however, negate the sterilization effect of a safe process and result in a spoiled food.

Improper Canning Practices

Consumers can all foods including products which are currently not recommended for home canning in Canada (vegetable mixtures, meat, poultry or fish are not recommended). Davis (1976) reported that tomato sauce and low acid vegetable mixtures were each canned by 20% of households. McDaniel et al., (1979) recorded that 17.5% of Manitobans surveyed canned meat, fish and poultry (79% of those people were rural; 21% were urban).

Home canners often use methods which are not recommended. A study of 366 home canners in Washington State (Bristol et al., 1965) reported that 50% of home canners canned low acid vegetables, meat and fish without a pressure canner. McDaniel et al., (1979) reported that in 75% of the cases where meat, fish or poultry were canned an incorrect method was used. Fields, Zamora, and Bradsher (1977) reported that 90 of 292 jars of tomatoes, donated by participants in a Missouri study, had been canned by the open kettle method; 71 of 290 jars of green beans had been canned by the open kettle or the boiling water method. David (1976) stated that 33% of those homemakers canning low acid vegetables and vegetable mixtures in the United States used the boiling water bath process. The open kettle method was used by 25% of the households canning vegetable mixtures and 18% of those canning vegetables.

Other poor practices include the use of non-standard packers' jars instead of canning jars (Davis, 1976; Fields et al., 1977); the use of paraffin for sealing fruits and vegetables, and the serving of canned vegetables with no prior heating (Davis, 1976).

Spoilage Problems with Canned Products

Spoilage of home canned products occurs with alarming frequency. Davis (1976) reported that, in 1975, 25% of canners experienced spoilage of fruits or vegetables. Veget-

ables and vegetable mixtures accounted for 17% of the spoilage while tomatoes and tomato sauce accounted for 23% of the spoilage reported. Fields et al. (1977) reported that 116 of 292 jars of tomatoes and 41 of 290 containers of green beans had viable microorganisms present on analysis. The presence of viable microorganisms in home canned tomatoes is not unusual since the process for tomatoes is not designed to kill all organisms. The organisms reported, however, are indicators that faulty processing or post process contamination occurred.

Spoilage Organisms

Some spore forming microorganisms are responsible for food spoilage only. These include: *Bacillus coagulans*, *Clostridium pasteurianum*, and *Clostridium sporogenes*. *B. coagulans* is responsible for flat-sour spoilage in tomatoes, cream-style corn and other vegetables that cool slowly. *C. pasteurianum* can cause butyric acid spoilage in tomatoes (Powers, 1976). Occurrences of spoilage from seal failures may involve many microorganisms.

Cases of Illness Associated with Canned Foods

In Canada, processed fruits and vegetables have caused many cases of illness. Todd (1976) reported that, in Canada in 1973, processed low acid vegetables caused 4 incidents of illness involving 36 people. In 1973, processed acid fruits and vegetables caused 17 incidents of illness involving 46 people. In 1974 there were 18 incidents of illness caused by 17 processed low acid vegetables involving 56 people. There were 11 incidents of illness involving 67 people caused by processed acid vegetables and fruits (Todd, 1977).

The one case of botulism in 1973 was caused by processed low acid vegetables (commercial mushrooms). Since that case there have been no confirmed incidents of botulism from commercial or home canned products in Canada (Hauschild, 1978). Dolman (1974) reported 5 outbreaks of botulism in Canada between 1919-1973 from preserved non-marine products; two of these were from home canned products (string beans, green peppers).

The number of cases of botulism in the United States has been rising. In the United States, Horowitz and Hughes (1977) of the Center for Disease Control (CDC) reported 68 outbreaks of food-borne botulism from 1970 through 1975 with a mean of 11.3 outbreaks a year. The CDC (1976) reported 27 occurrences of botulism from October 1, 1975 to September 30, 1976.

Lack of adequate home processing was clearly implicated in these cases of illness. Of the 68 outbreaks between 1970 and 1975, 36 were reported as having been caused by inadequately processed home canned foods. Of the 36 outbreaks from inadequately processed home canned foods, 20 outbreaks of botulism resulted from failure to preserve low acid vegetables under pressure (CDC, 1977). Of the 27 cases of botulism reported between 1975 to 1976 home processing was responsible in 11 of the 13 cases where the food responsible was identified.

Food Poisoning Organisms

Foods with bacterial growth may cause illness, regardless of whether or not spoilage is evident. Homemakers indicated that they would taste food, even if its safety was questionable, to determine its suitability before serving to the family (USDA, 1977). This is a very hazardous practice.

The major food poisoning species that can survive cooking and processing are *B. cereus*, *C. botulinum*, and *C. perfringens* (Hobbs, 1975). Of these, *C. botulinum* is the only organism that can be a direct cause of death. *B. cereus* and *C. botulinum* cause illness if they germinate and produce toxin in the food. *C. perfringens* causes illness if it germinates and produces toxin in the small intestine. It is unusual for *S. aureus* to cause spoilage of canned vegetables but it has been reported to do so (De Figueiredo and Splittstoesser, 1976).

Conclusions

Professionals must emphasize the reasons behind correct techniques and the importance of following recommended processing methods and established times to consumers. Consumers still use poor canning practices. As the number of home canners increases, the health statistics will reflect consumer carelessness. Consumers will be more motivated to use good canning techniques if they know the reasons for canning successes and spoilage.

Acknowledgments

The author is indebted to Marie Slusar and Dr. Andreas Hauschild for assisting in the preparation of this paper and to Pierrette Beaulieu for translating the abstract.●

REFERENCES

- Agriculture Canada. 1976. Canning Canadian Fruits and Vegetables. Publication #1560. Ottawa, Ontario. K1A 0C7
- Bristol, G., Brown, M., Craig, J. and Wise V. 1965. Do Homemakers Still Can Foods? Journal of Home Economics 57, 3:211-212.

- Center for Disease Control, Bureau of Epidemiology. 1976. Clinical, Epidemiological, and Laboratory Aspects of Botulism. Oct. 1, 1975 to Sept. 30, 1976. Atlanta, Georgia.
- Davis, C.A. 1976. Home Canning. United States Department of Agriculture Publication No. 78-8850. Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.
- De Figueiredo, M.P. and Splittstoesser, D.F. 1976. Food Microbiology — Public Health and Spoilage Aspects. AVI Pub. Westport, Conn.
- Dolman, C.E. 1974. Human Botulism in Canada (1919-1973). Canadian Medical Association Journal 110:191-200.
- Fields, M.L., Zamora, A.F. and Bradsher, M. 1977. Microbiological Analysis of Home Canned Tomatoes and Green Beans. Journal of Food Science 42, 4:931-934.
- Hauschild, A.H. 1978. Chairman for Botulism Reference Center, Health and Welfare Canada. Ottawa, Ontario. (personal communication)
- Hobbs, B.C. 1975. Microbiological Hazards. Toxicology 4, 3:389-391.
- Horowitz, M.A. and Hughes, J.M. 1977. Center for Disease Control — Food Borne Botulism in the United States 1970-1975. Journal of Infectious Diseases. 136, 1:153-159.
- McDaniel, M., Diamant, R., Loewen, R., and Berg, D. 1979. Dangerous Canning Practices in Manitoba. University of Manitoba, Winnipeg, Manitoba. Canadian Journal of Public Health. (in press)
- Powers, J.J. 1976. Effect of Acidification of Canned Tomatoes on Quality and Shelf Life. Critical Reviews in Food Science and Nutrition 7:371-378.
- Todd, E.C. 1976. The First Annual Summary of Food-Borne Disease in Canada. Journal of Milk and Food Technology 30:426-431.
- Todd, E.C. 1977. Food-Borne Disease in Canada — 1974 Annual Summary. Journal of Food Protection 40, 7:493-498.
- United States Department of Agriculture. 1977. Food Safety; Homemakers' Attitudes and Practices. Agricultural Economics Report No. 360. Washington, D.C. 20250
- Zottola, E.A. 1978. Extension Food Microbiologist, University of Minnesota Agricultural Extension Service, St. Paul, Minnesota. (personal communication)

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Lillian Massey Institute International

An idea was conceived at the conclusion of the Philadelphia meeting of professionals gathered to discuss the working paper, *Home Economics Defined*, by Marjorie Brown and Beatrice Paolucci. This idea was to form an institute which would be multidisciplinary in nature to focus on the problems faced by families as we move to the year 2000. Further consideration suggested that the issues involved were global in nature. Thus, a committee in Toronto began to meet to develop a proposal to form an international institute.

Proposal

The Committee to Establish the Lillian Massey Institute (International) is proposing to establish an institute for advanced study to investigate and research human problems which focus on human and family needs worldwide. We believe that human beings are more similar than different in their universal concerns for the problems of child bearing, socializing, and the quest for food, health care, energy, shelter, and clothing. At the same time, we believe that the effort to meet these basic needs and achieve a level of

self-reliance occurs in a cultural content which cannot be ignored. We believe that applied science approaches which include consideration for the values and ethics involved will shape the more innovative educational endeavors for the next several years. This view we share with many leading futurists (1) (2) (3).

Our aim is to improve quality of life globally through an integrated approach to the ethical and human ecological elements of decision making. Our intention is to attract a community of scholars from the broad range of disciplines which study human systems (2, p. 115) as well as committed individuals from different countries who share the aims of the institute.

We envision that this community will be a centre of innovation paying particular attention to the creation of new modes of research, experimenting with various modes of communication and interaction among disciplines, and developing innovative ways of adapting to such realities as new computer and biological technologies, and energy and environmental constraints.

Another sphere of innovation would be providing diverse educational opportunities. Short stimulating courses, conferences on emerging issues, and credit courses in special-

ized areas would be offered to participants from around the world. Through these activities it is expected that an informal network of communications would develop in addition to the more formal activities of information gathering and dissemination that would take place.

We plan to establish an independent institution with its own Board of Directors. We are thinking in terms of 60% of the members being Canadian, including representatives from at least three post secondary institutions. Also included would be a Canadian representative from such organizations as the International Development Research Centre and Match International. International representation could come from such groups as the International Federation of Institutes for Advanced Study and the International Federation of Home Economics. There would be additional members from the international community, a specific number being from developing countries.

The Committee to Establish the Lillian Massey Institute is currently working to develop and refine specific goals and objectives for the institute which could become part of a charter. In this regard consultations have been and are being held with Canadian and International leaders in higher education and

© The Committee to Establish the Lillian Massey Institute. By permission. Submitted by May Maskow, Ryerson Polytechnical Institute, Toronto.

international development. Concurrently advice is being sought from authorities in the development of institutes with a research and international thrust. Such individuals will be sought to sit on an advisory board.

Location

The Committee is interested in locating this institute in the Lillian Massey Building at the corner of Bloor Street and University Avenue in Toronto. This building, currently up for sale by the University of Toronto, was a bequest to the University by Lillian Massey Treble, daughter of the late Hart Massey. The building was dedicated to the further education of women.

The Lillian Massey Building is located in the heart of Toronto to the north of Queen's Park, directly across from the Royal Ontario Museum and is considered to be an historic site. The natural beauty of the marble and solid oak construction and the quality and style of this turn of the century architecture (1906) gives a simple and dignified character that would be impossible to duplicate.

The university has indicated that the cost to purchase both the building and land would be \$3,100,000. Their estimate for renovations to bring the building up to Fire Marshall and Building Code requirements is \$1,900,000. The Committee has asked an architectural firm to prepare an estimate for both renovation and appropriate restoration.

In its seeking to acquire the use of the Lillian Massey Building as the location for the proposed institute the Committee wishes to make it clear that the objective of establishing The Institute and of acquiring the Lillian Massey Building as its location are separate issues. The primary goal is the establishment of The Institute in order to carry out its stated aims and objectives.

Finally it might be appropriate to include some background on Lillian Massey Treble and with this some insight as to why her name was chosen for The Institute.

The daughter of Canada's most successful pioneer, Lillian Massey Treble was far ahead of her time in both her goals and her accomplishments in the support of education for women. It might be said that the aim of The Institute would correspond to the kind of futurist thinking and action that Lillian Massey Treble conceptualized at the turn of the Century given the social influences of that period of our history.

Furthermore, as it is planned that there would be a significant female component to the Board of Directors, the administration, and the academic/creative aspects of The Institute, it could be considered appropriate that the name of an innovative Canadian woman be used.

In order to make the idea which was conceived in Philadelphia an international reality, a significant amount of funding is being sought in the form of obtaining support from major founda-

tions and/or granting agencies.

Meanwhile The Committee to Establish the Lillian Massey Institute is seeking funds for a planning grant so that it can proceed with this major undertaking. It is felt that if successfully developed The Institute could provide a major advance for the home economics profession.

Donations can be made to The Committee to Establish the Lillian Massey Institute, Box 5997, Station A, Toronto, Ontario, Canada M5W 1P4. ●



Reading Room with Portrait of Lillian Massey

References

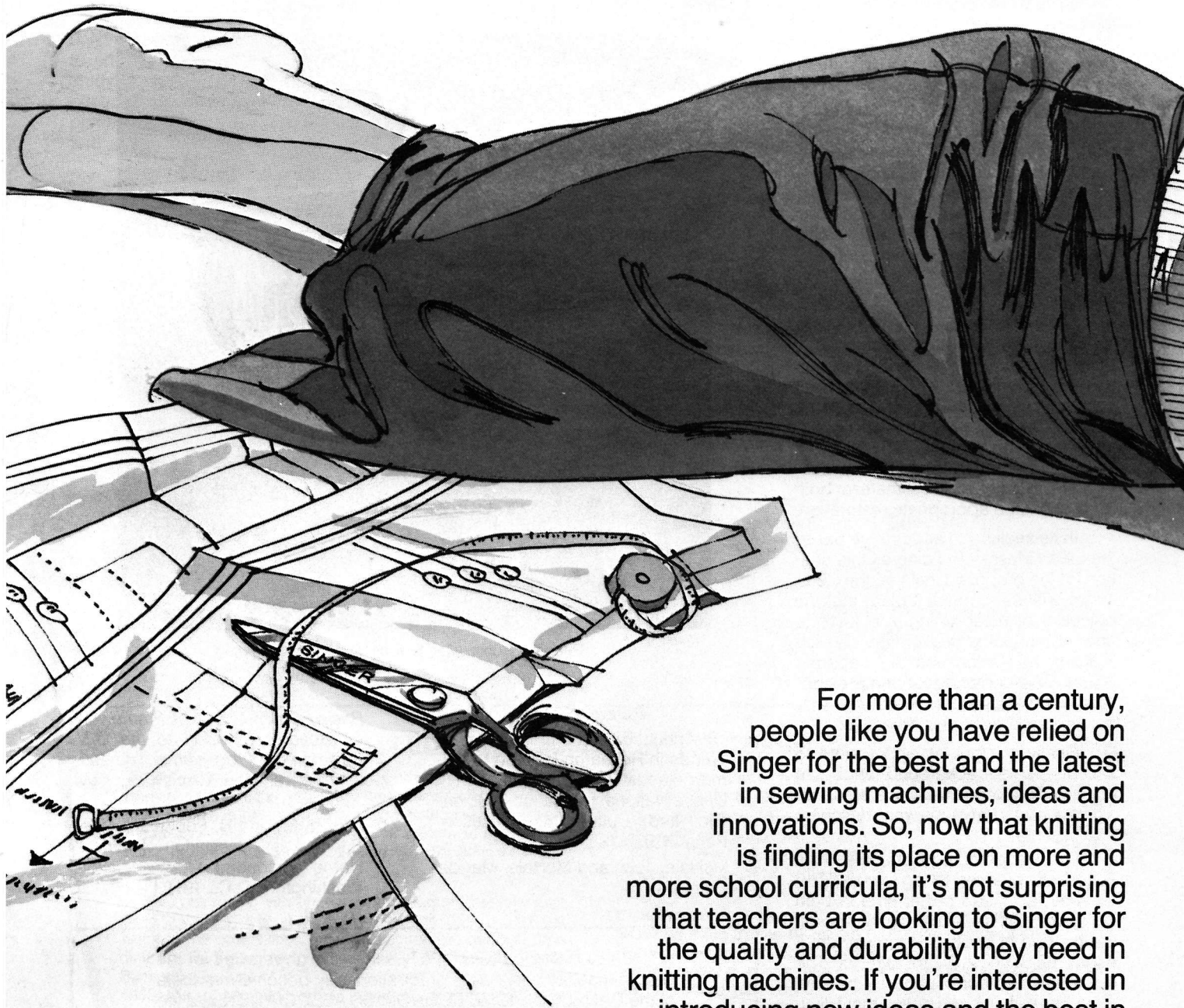
1. "Bi-Annual Report on Priorities and Trends in Research Related to Human Needs" United National Educational, Scientific and Cultural Organization, Paris, 1978. (SC-78/W5/54)
2. McHale, John and McHale, Magda Cordell

Basic Human Needs: A Framework for Action, A Report to the U.N. Environment Programme, Transaction Books, New Brunswick, New Jersey, 1977.

3. Brown, M. and B. Paolucci "Home Economics: A Definition" American Home Economics Association, Washington, D.C. 1979.

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Canadian Home Economics Journal, Fall 1979

CHEA AWARDS AVAILABLE 1980-81 ACADEMIC YEAR

The Mary A. Clarke Memorial Scholarship — \$2,000

This scholarship was established as a tribute to Mary Clarke, a valued member of the Canadian Home Economics Association and President from 1952-1954.

For a graduate in home economics from a Canadian university who is a resident of Canada and who is planning to undertake, or who at present is engaged in graduate study proceeding to a higher degree. The award will be based on scholarship, personal qualities, past and/or potential contribution to the profession of home economics, and financial considerations.

(CHEA Scholarship Fund Award)

The Silver Jubilee Scholarship — \$2,000

The Silver Jubilee Scholarship was established to commemorate the twenty-fifth anniversary of the founding of the Canadian Home Economics Association.

For a graduate in home economics from a Canadian university who is a resident of Canada and who is planning to undertake, or who at present is engaged in graduate study proceeding to a higher academic degree. The award will be based on scholarship, personal qualities, past and/or potential contributions to the profession of home economics, and financial considerations.

(CHEA Scholarship Fund Award)

The Ruth Binnie Scholarship — 2 Awards - \$3,500 each

This scholarship was established through the generosity of the late miss Ruth Binnie, Halifax, Nova Scotia, to promote and encourage the quality of home economics education in Canada.

For a graduate in the field of home economics or home

economics education, holder of a professional teaching certificate, who is a resident of Canada, who is planning to undertake, or who is at present engaged in full time graduate study at the Master's level in a home economics area at an accredited institution. Preference will be given to candidates in the field of home economics education. The candidate must have a high commitment to teaching and to the profession, one who will follow the principles and practice of home economics education in teaching junior or senior high school students. The award will be based on scholarship, personal qualities, contribution toward home economics education in junior and/or senior high school and potential in the education field.

(CHEA Ruth Binnie Scholarship Fund Award)

The Carnation Company Incentive Award 1980 — \$500

This award will be presented to a graduate in home economics, or in a closely allied discipline, from a Canadian university who is planning to undertake graduate study proceeding to a higher degree. Special consideration will be given to a student undertaking post graduate study in foods or food science. The award will be made on the basis of academic achievement, personal qualities, financial need and an intended career in the food industry.

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Application forms available from:

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THE ELIZABETH L. EMPEY LECTURESHIP

The Faculty of Home Economics, University of Alberta, has established the Elizabeth L. Empey Lectureship in Home Economics. It is planned that an outstanding speaker will be invited each year to the University of Alberta to speak at a public lecture on a topic related to the discipline of home economics.

This Lectureship will commemorate the many contributions Dr. Elizabeth Empey has made over the past twenty-five years to the professions of home economics, nutrition, and dietetics. Dr. Empey resigned as Dean of the Faculty of Home Economics in June of 1976 after serving in that capacity since 1960; she subsequently retired from the University of Alberta, June 30, 1978. The list of her involvement in various professional organizations, in home economics generally, in nutrition and dietetics specifically is a long one; suffice to say

this involvement was invariably one of leadership and was on all levels — local, provincial, national and international.

Contributions to the fund should be payable to The University of Alberta and sent to:

Mr. L. Howell, Special Funds
Comptroller's Office, University of Alberta
Edmonton, Alberta T6G 2M7

Contributions sent to the above address should be **designated** as being for **The Elizabeth L. Empey Lectureship in Home Economics**. Such contributions are income tax deductible and an official receipt from the University of Alberta will be sent to each donor.

Inquiries concerning the above may be forwarded to Louise Mason, Administrative Officer, Faculty of Home Economics, University of Alberta, Edmonton, Alberta T6G 2M8.

Stages of Adult Sexuality: The Canadian Dilemma*

Norah C. Keating

In this, the year of the child, it seems paradoxical that we are in the process of developing a new focus of interest on adult development. This interest is not really surprising when one considers that we are living in a culture which is not only changing rapidly but which has come to value change per se. To believe in growth one must believe that change is possible for adults as well as for children.

What is the impact of this growth orientation on models of sexual development? A persistent myth about adult sexuality is that for the adult to continue to be considered mature, he must change, but in changing he becomes progressively more asexual. Segregation of men and women, even husbands and wives, in nursing homes has been a sad example of this myth.

What is mature sexuality? For the purposes of this discussion, sexuality is the

"search for pleasure by way of a relationship with another, which arises in part from within, is influenced by societal attitudes and information regarding sexuality and finds satisfaction in an affectionate, caring partnership with another" (Adapted from Rubin, 1965)

Sexuality is not static. It changes within an individual's lifetime and it varies according to the period of history in which the individual was socialized. To illustrate these two elements of sexuality, this paper will have two parts: a description of four developmental stages of sexuality from early to late adulthood and a discussion of the attitudes and information about sexuality available in Canada when people presently in those four stages were being socialized.

Insert Table 1

Age 20-29 Intimacy Versus Isolation

The entrance into adult sexuality is through the often painful period of adolescence during which the young person faces difficult and sometimes contradictory tasks. To develop his unique identity means becoming a distinct individual and to do so he must separate himself from people he loves. Physically mature, he must delay the development of new intimate relationships until the 'right' time which might be

contingent upon developing a work career, achieving a certain level of education, or finding a marriage partner. At this stage in life, perhaps more than any other with the possible exception of old age, one's sexual drives and abilities may be quite out of phase with societal expectations concerning the appropriateness of sexual expression.

The major task of this stage is that of resolving this issue of developing intimate relationships in response to both biological needs for sexual interaction and social needs for the transfer of one's intimate relationships from the family to people outside the family.

TABLE 1
Stages of Adult Sexuality

Developmental Stage	Approximate Age	Period of Socialization Regarding Sexuality
Integrity versus Despair	70+	before 1930
Body Preoccupation versus Body Transcendence	50-69	1930-1950
Becoming One's Own Person	30-49	1950-1969
Intimacy versus Isolation	20-29	1970-1980

Age 30-49 Becoming One's Own Person

Some developmentalists have suggested that the individual who successfully completes the task of the previous stage and has the ability for real intimacy in his twenties may be too busy to invest his energies in such relationships in his thirties and forties. In the early thirties men and women may be too involved in mastering their careers, focusing on 'getting ahead', caring for children.

The saliency of the marriage relationship may be less central than that of the work identity or the parent identity. The danger here is the acceptance of the maturity myth, that one's sexual interaction is safe, that one's major intimacy needs will inevitably be met through marriage. The increasing divorce rate during this stage of the life cycle and the peak of extra marital sexual involvement are symptoms of continuing needs for intimacy which in many cases are not acknowledged. Intimacy comes harder at this stage because of competing demands for one's limited amount of energy; because of the assumption of the always available outlet in one's spouse for meeting intimacy needs; because of the family life cycle demands that put caring for the next generation as a primary task.

Norah Keating has a B.A. in Psychology from McMaster University in Hamilton, an M.A. in Psychology from University of Guelph, and an M.A. in Marriage and Family Counselling, a Certificate in Gerontology and a Ph.D. in Child and Family Studies all from Syracuse University in New York. She has been in private practice in Marriage and Family Counselling, worked for Counselling Services at Seneca College of Applied Arts and Technology and is currently employed as an Assistant Professor, Division of Family Studies, Faculty of Home Economics, at the University of Alberta. Her research interests are in Stages of the Adult Life Cycle and the Processes of Aging.

* Revision of a paper presented at the Alberta Home Economics Association Conference, April 6, 1979.

Near the end of this stage, women may come to a critical period of re-evaluation during menopause. If a woman defines her sexuality primarily in terms of her ability to bear children, the cessation of that function could certainly be traumatic. Menopause is a critical period in sexual development which provides opportunity for choice: increased freedom to be sexual or the end of definition of self as sexual. A parallel process for men also occurs. One of the elements of the 'mid life crisis', is that of the self fulfilling prophecy of declining sexual responsiveness. To continue one's sexual development one must leave this stage with a definition of self that is sexual despite the fact that one no longer has the physical capacity to bear children (for women) or is as potent as he has been (for men).

Age 50-69 Body Preoccupation Versus Body Transcendence

In North America we have come to equate youthfulness with physical attractiveness, with sexuality. However, by the time one reaches his fifties he inevitably begins to experience some bodily changes. For those people who have internalized this definition of 'I am sexual so long as I am physically youthful', changes in appearance could be experienced as grave insults. Although the task of this stage is to develop less reliance on physical signs of beauty or virility, the ability to achieve that task differs for men and women. Sontag (1972) describes this issue as the double standard of aging in which older women are less attractive to younger men than older men to younger women.

One must redefine, or perhaps re-establish his intimate relationships during this phase. It is a time of looking again at one's spouse or partner as the demands of children, work, getting ahead, diminish. If one has not resolved the preceding stage by declaring themselves asexual, this can be a period of increased time to invest in those relationships.

Impinging upon this opportunity is the beginning of socialization for old age which, if successfully completed, has in the past meant a linear decline both in sexual expression and in the development of new intimate relationships.

Age 70 and Beyond: Integrity Versus Despair

According to Erickson, the possessor of integrity is ready to defend the dignity of his life style against all physical threats. In the case of maintaining a sense of oneself as a sexual person this means not only coping with bodily changes but changes in prescribed outlets for sexual expression. One's need for intimacy, closeness and affection not only continues through this stage but may be intensified as one gets older, as precious intimacies are lost and as the opportunities for the creation of new ones are diminishing.

The pervasive myth about older people is that they are asexual. Their dating or sexual activities are open to shock, derision or amusement. These attitudes further limit the opportunity for the development of intimate relations at a time when those opportunities are already severely limited. A related myth is that older people have lost their sexual drive and so to even think about sexuality and older people is an anomaly.

However as Mary Calderone (1978, p.206) says:

"continued sexual interest and activity in later years is substantially greater for persons who have been highly interested and highly sexually active in their younger years. This is one bank account that, the more you spend it the higher is the balance left."

Maintaining one's integrity as a sexual person is part of a process hopefully begun far earlier in which one's definition of self as a sexual person shifts from an external to an internal focus, from I am sexual because I am strong and young and fertile, to I am sexual.

What have been the messages received by Canadians about their sexuality? One place where people have access to such information is through the popular press. In Canada, two magazines which date back to the early 1900's are *Chatelaine* and *Maclean's*; the former a women's magazine with a female editorial staff; the latter a news magazine with a male editorial staff. A sampling of articles, advertisements and editorials shows that covert and overt messages about sexuality and its expression have changed radically over the past seven decades. I have made the assumption that people have internalized basic scripts about their sexuality by about age 20. Therefore people who are now over 70 received their early socialization before 1930. Messages about sexuality during that era were either indirect or strongly negative. Women were depicted as feminine (not sexual), young and lovely.

"Feminine charm! What poems have been inspired by it . . . what hearts won by it . . . what power to attract and to hold . . . and yet how fragile and delicate a thing is feminine charm!" (*Chatelaine*, April 1928, p. 81). Whereas women were feminine and charming, men were gallant. "All the world loves a lover. And whoever heard of a modern lover who did not lay his offerings of fidelity at her feet in the form of the choicest chocolates made." (*Maclean's*, January, 1925).

There was little one could glean about sexual relations between men and women. The implicit message was that courtship was romantic but rather ethereal. To assure the purity of courtship other people were ever present. Almost all the early pictures of couples in *Chatelaine* had a third person in the background.

What of those who did not follow the pattern of romantic courtship followed by marriage and children? The promised consequences were dire indeed. From an article in *Chatelaine* in May 1928 (p.4) on sexual relationships outside marriage come the following description in which such relationships were called companionate marriages.

" . . . companionate marriage constitutes an agreement between a flirt and a philanderer to live together as long as it suits them, which is usually until the period of satiety."

How do these early messages affect the ability of the person who is now over seventy to resolve the developmental tasks of that period? The choices available are very narrow. If one is unmarried he might have a friendship relationship but never a sexual one. Since marriage at this stage cannot produce children the point seems moot. Older people are not youthful and attractive. They are unlikely to form romantic attachments and were that to happen and be accompanied by sexual feelings, those feelings are only transitory and will pass. What place is there for intimacy here?

People who are now between fifty and sixty-nine years old received their early messages about sexuality between 1930 and 1950. Messages about sexuality during these next two decades were somewhat more diverse but still with a strongly moralistic basis. The themes of romance and the importance of marriage continued, with a shift toward a more explicit discussion of sex education and a clearly defined difference between the sex roles of men and women.

Romance was still alive and well.

"So one and one really make one. A moment bright with rapture and suddenly you know. Winged ecstasy set to shimmering music. You're whirling through space, lost . . . yet you've just found yourself for the first time! This is the end of the beginning of your life. This is love, love, love . . . Woodbury. For the skin you love to touch" (*Chatelaine*, Feb. 1945, p. 37).

However, although romance was assumed to lead eventually to marriage and children, women were seen in a dual role, not only as mothers but also as playmates, though the motherhood still considered the highest virtue. Female movie stars of the thirties and forties were depicted as sexy, glamorous and romantic — but they were not to be emulated too closely. After all, the parenting role still came first. According to *Maclean's* in 1934: "Mae West is acknowledged by medical men as a boon to prospective mothers because she is popularizing the more substantial figure." (p.13).

It was in the 1930's that the first article about sex education appeared. It was written for mothers of teenage girls who were to tell their daughters about sex. The purpose?

"It is easy to impress her (the teenage girl) with the dignity of motherhood, the miracle of giving life, the function of her body as the medium for this miracle. If she accepts this idea it is a deep rooted prejudice in favor of purity" (*Maclean's*, October, 1934, p. 19).

There were few messages for the present group of people aged 50 to 69 on how one re-established an intimate relationship with one's spouse in the absence of the parenting role. Women were young frivolous playmates or mothers, and purity was virtue. Men were prizes to be won as husbands in return for virtue given after marriage. Sexual growth and development were simply not discussed. As long as mother could get her virginal daughter safely married, intimacy was taken care of. The maturity myth was alive and well in this era. Any information about sexuality and the aging process was conspicuously absent, a message by default about the importance of sexuality at that stage.

People now between 30 and 49 years old received their early socialization about sexuality in the 1950's and 1960's. Throughout the fifties and sixties discussion of sex and sexuality became progressively more open and less moralistic. A positive value on information about sexuality was evident with articles on the Kinsey report, the birth control pill, planned parenthood, concerns of women about physical changes in their bodies during pregnancy or at menopause.

The new open information about sexuality was still within a context of clearly defined sexual roles for men and women. The emphasis was mainly on things external to the intimate husband wife relationship. Sharing meant,

"They start their planning long before the wedding and they plan everything from how many children to how many rooms, whether to send the children to nursery school and what color to paint the den." (*Chatelaine*, June 1955)

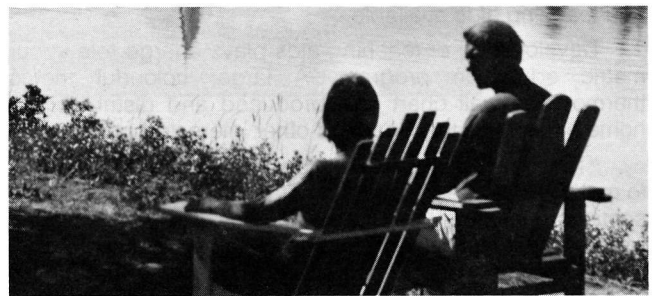
Despite all this domesticity, men were portrayed as wanting sexual involvement outside marriage. Several cartoons in *Maclean's* (1955) showed philandering husbands and angry but accepting and rather powerless wives. Women were portrayed as having sexual needs and they might even be sexually active before marriage.

The first developmental task of sexuality in one's thirties and forties is to continue to invest in primary intimate relationships despite conflicting demands of work and children. Socialization for this task was almost absent in the 1950's and was just beginning in the 1960's. The continued definition of self as sexual despite the cessation of reproductive ability for women and the mid-life crises for men may prove more difficult with few models, at least in the popular press, on how to achieve that task.

For young people now in their twenties any difficulties in resolving early tasks of developing one's identity may be hampered less by traditional conservative dogma about sexuality than the liberal dogma of the 1970's. The themes of the 1970's are of variety and experimentation and sexual openness. A few titles from *Maclean's* in 1975 illustrate this point. "Two good reasons why Raquel Welch survived the Sixties (illustrated caption), Undressed Rehearsal, Miss Nude World." The list is endless.

The new liberalism at its best frees people to choose the kind of intimate relationships that best meet their needs. At its worst it inhibits the positive transference of intimacy from family to people outside the family. The new openness does mean that accurate information about sexual functioning is readily accessible. It means that safe, reliable contraceptives are available to all who choose to use them and that sexual intercourse and procreation need not inevitably follow one another. Choice is the key ingredient of sexuality in the seventies. For the first time too is a beginning awareness in the popular press that sexuality is a lifelong process. For example, an article in *Chatelaine* (March, 1973) was entitled "What Every Young (or Old) Couple Should Know About Sex."

The cohort of people now in their twenties have available to them information, choices, abundant life styles some of which are coming to be accepted as legitimate alternatives to traditional marriage. Whether they will be able to resolve the tasks of sexual development more easily than older cohorts remains to be seen.



BIBLIOGRAPHY

- Calderone, M. Sex and the Aging. In R. Gross, B. Gross & S. Serdman (Eds.), *The New Old: Struggling for Decent Aging*. New York: Anchor, 1978.
- Chatelaine Magazine*, 1920-1975.
- Deutsch, H. In C. Gordon & G. Johnson (Eds.), *Readings in Human Sexuality: Contemporary Perspectives*. New York: Harper Row, 1976-1977.
- Erikson, E. *Identity Youth and Crisis*. New York: W. W. Norton, 1968.
- Heffner, H. *Playboy*, 1965, 38 (1).
- Levinson, D., Darrow, C., Klein, E., Levinson, M. and McKee, B. Periods in the adult development of men: Ages 18 to 45. In A. Sargent (Ed.), *Beyond Sex Roles*. New York: West, 1977.
- Maclean's Magazine*, 1920-1975.
- O'Neill, G. and O'Neill, N. *Shifting Gears*. New York: Avon, 1974.
- Rimmer, R. *The Harrod Experiment*. New York: Bantam, 1966.
- Rubin, I. *Sexual Life After Sixty*. New York: Basic Books, 1965.
- Sontag, S. The Double standard of aging. *Saturday Review*, September, 1972.

Home Economics Branch Involvement In New Brunswick's Metric Education

Marcia Brennan
Home Economics Branch
New Brunswick Dept. of Agriculture



The Home Economics Branch of the New Brunswick Department of Agriculture and Rural Development consists of 11 Home Economists located throughout the province. The mandate of the branch is to provide home economics education to rural New Brunswick families. Part of this education, since 1974, has been the delivery of educational programs in metric conversions. Although metric education is only a small part of the total role of the Home Economics Branch, it is incorporated into the various programs offered. A great amount of metric teaching can be accomplished within such topic areas as kitchen planning, clothing buymanship, sewing for the home and preschool nutrition, to name but a few.

A key part of the branch's metric education program is the publication of a quarterly newsletter "Metric Update". Since the first issue in December, 1976, the mailing list has grown to 161. Its primary purpose is to keep home economists informed on Canada's conversion to SI, particularly in relation to home economics and the consumer. Included in it are teaching ideas and reviews of resources and teaching aids available.

Development of teaching aids plays a large role in our metric education program. A large, colourful metric thermometer wall chart was produced and distributed to home economics teachers and other interested persons.

"Teaching Metric The Fun Way" is a workbook designed to make learning and thinking metric more fun. Divided into sections, the workbook provides activities (crosswords, puzzles, projects, display ideas) in the following areas: foods, textiles, housing and SI in general. The Home Economics Branch received permission from Metric Commission Canada to use the national metric symbol on "Teaching Metric The Fun Way".

A very successful project was a production of 5,000 wall calendars distributed in late 1977, titled "Metric At Home — Your 1978 Metric Calendar". Due to cost, a 1979 calendar was not produced, although numerous requests during late 1978 and early 1979 indicated that it would have been well received.

Campaigns of a national nature have been actively developed in New Brunswick. In March, 1978, the Home Economics Branch co-ordinated the provincial promotion for "Public Awareness Month For Metric Recipes". This campaign saw press kits delivered to New Brunswick's newspapers and radio stations and metric recipe workshops conducted for food editors and other interested persons. A

mall display on the theme, "Metrics In The Kitchen" drew approximately 1,000 people in four locations. Public response and media coverage to Metric Recipe Month in New Brunswick were excellent.

During the summer of 1978, in conjunction with the July 1st target date for fabric conversion, the Home Economics Branch sponsored 18 fabric and textile workshops. Participants included fabric sales personnel, store managers, seamstresses, 4-H leaders, home economics teachers and representatives from media and government. Also, a travelling mall display was set up in six locations with home economists present to answer questions and distribute information on the change-over of fabric and notions to the metric system.

Any home economics related metric program must deal with metric recipes. Several recipes have been developed and tested and used in our brochures for distribution, consumer columns, television programs, etc. By providing good, tested metric recipes to help the consumer, there is a greater desire to purchase metric measures and learn metric terms. An effort is being made to use at least 75% metric recipes during 1979. By 1980, it is hoped that our 100% goal will be achieved. New Brunswick's new 4-H Foods and Nutrition Project, "4-H and the Food Four" features 100% metric recipes.

The Home Economics Branch is presently working on a metric pamphlet of nutritious snacks for publication in the fall of 1979.

The Home Economics Branch believes in speaking up. Two extensive surveys on the availability of metric cooking measures in New Brunswick stores have been conducted. Store managers have been made aware of incorrect measures when offered for sale and asked to stock only correct ones.

Metric education is an on-going program for the branch. Whatever the form of education, however, whether it be a workshop for teachers, a talk to a group on metrics in the kitchen, a radio interview or any of the many modes used the goal is the same: To provide metric information in a positive manner emphasizing the advantages of the metric change-over. Films, slides and filmstrips, games, demonstrations and group discussions allow the learning to be fun. The home economist is in a key position to aid consumers in an easy transition to the metric system. The Home Economics Branch will continue to work diligently; we see it as an opportunity to develop home economics leadership. ●

INFANT AND CHILD FEEDING

POSITION PAPER — CANADIAN HOME ECONOMICS ASSOCIATION

The first position paper developed by the Canadian Home Economics Association deals with Infant and Child Feeding. The paper was endorsed at the National Conference in St. John's, Newfoundland, July, 1979, and emphatically supports breast-feeding as the best choice for infants. The paper outlines the background of the concerns and the objectives of CHEA related to the feeding of the young, and presents recommendations and initiatives to be supported by the Association.

Many of the concerns expressed in the paper apply in Canada and abroad. Areas of poverty in Canada such as native communities, and the rural and urban poor, encounter difficulties similar to those in the developing world. The Canadian Home Economics Association has concern for overall policy in the area of food and nutrition. Here the paper is global in scope. It is also action oriented.

The biggest business in the world, and the most important business in the world, and the most worthwhile business in the world, is the business of raising babies. (Dr. Brock Chisholm, Director General of World Health Organization — 1948-53.)

BACKGROUND AND OBJECTIVES

Home economists have expertise in several critical resource areas such as food, housing, money, and most importantly, human resources. Right at the heart lies the infant and child.

Many factors must be considered when discussing the transition made by children during the first two years of life from a liquid diet to a mixed diet. The healthy development of infants during the critical early months of life depends not only on appropriate feeding but also on sanitation and a healthy environment. The task of ensuring a safe and satisfactory transition from a liquid to a mixed diet will differ according to conditions in specific societies.

Infant feeding practices appear to be shaped largely by social, cultural, economic and commercial pressures. These influences sometimes take precedence over health considerations in determining an infant's diet.

Home economists recognize the need to work towards changing undesirable influences to encourage breastfeeding as the best choice.

Home economists also recognize that some mothers, due to time constraints, work responsibilities outside the home, or because of more subtle pressures such as embarrassment over breast-feeding in public, may choose not to breast-feed. Those mothers also need accurate information on feeding practices and support for their role as mothers.

Scientific findings emphasize that breast-feeding has unique nutritional, immunological and psychological advantages. Studies point to the value of human milk constituents and to their interaction which protects the infant against gastroenteritis and iron deficiency.

Human milk is not cost-free since the lactating mother must eat additional foods to sustain adequate lactation. The cost of this food is usually less than the cost of formula feeding. In developing countries and in disadvantaged communities in North America attempts are often made to "stretch" the formula by overdilution. This, coupled with poor sanitary techniques during preparation, results in malnutrition and infection.

Clinical studies have demonstrated that exclusive breast-feeding and the avoidance of the addition of supplemental foods for the first four to six months of life is good prevention against food allergy in infancy. Cow's milk is the most common food allergen in infancy.

Early and prolonged body contact between a mother and her baby is an important factor in maternal-infant bonding. This is significant for the psycho-social development of the child.

There is suggestive evidence that formula feeding, coupled with the very early weaning of infants to non-milk foods may result in overfeeding of infants thus contributing to infant obesity. With breast-feeding, the infant, rather than the mother, controls the amount of food intake.

Thus breast-feeding has an important role to play in preventing many of the child health problems that plague mothers world-wide. In the developing world and disadvantaged communities in the industrialized world concerns include malnutrition, infection and retarded development. These are in marked contrast to those of the affluent world where over-feeding, obesity and allergies are current concerns. Increasing breast-feeding would be a key factor in overcoming all of these problems.

Breast-feeding declined to low levels in the 1960's in North America. The Canadian Home Economics Association supports the "rediscovery" of breast-feeding that we are now experiencing. However, in many countries a pervasive decline in breast-feeding continues. The reasons for this trend are varied and complex, but appear to be, in large part, due to western cultural influences.

The Canadian Home Economics Association supports the statement, by the Nutrition Committee, Canadian Paediatric Society (Canadian Journal of Public Health, Jan/Feb 1978); which says:

Despite increasing evidence for the superiority of human milk, artificial feeding has progressively supplanted breast-feeding throughout much of the industrialized world. The decline of breast-feeding in industrialized society began about 50 years ago, and later spread to developing countries. This has had implications for infant morbidity and mortality and for the economy of those nations which can least afford to waste their resources.

In developing countries, both economic and health considerations speak conclusively for breast-feeding. The physiological role of breast-feeding has tended to be forgotten in the industrialized world with the marked reduction in morbidity and mortality of bottle-fed babies which resulted from improvements in housing, sanitation, public health services, the rise of antibiotics and technological advances in the formulation and manufacture of infant formulas. However, newer information has suggested that significant advantages still exist for the breast-fed infant. Therefore, it seemed timely for the Committee to evaluate this new information in order to provide up-to-date guidance for physicians and other health workers and for the public, to study the reasons why many mothers turn to artificial feeding and to propose ways and means to increase the popularity of breast-feeding.

CONCERNS OF THE CANADIAN HOME ECONOMICS ASSOCIATION RELATED TO THE FEEDING OF THE VERY YOUNG

The Canadian Home Economics Association recognizes that many of the concerns expressed in this paper apply at home and abroad. Areas of poverty in Canada such as native communities, the urban and rural poor, encounter difficulties similar to those in the developing world. There is general concern for overall policy.

CONCERNS THAT APPLY ON A WORLD-WIDE BASIS

- The lack of leadership and policy relating to infant and child feeding practices, thus thwarting co-ordinated

positive action in developing infant and child feeding improvement programs.

- The fragmented efforts of professional associations, government, industry and the lay public to meet apparent similar goals, i.e., promoting feeding practices that are most beneficial to infants and children.
- The inadequate involvement of the food industry at all levels (developmental, production and retailing) in advancing the nutritional well-being of infants and children.
- The time of introduction of weaning-foods, the cost, and the need for careful evaluation of commodity mixes and supplements to ensure that they apply appropriately to local situations.
- Women with a poor profile (low socio-economic, lack of education, poor hygiene conditions, undernourishment, illness, and in some cases superstition-bound) are easily persuaded that their milk is inferior to formula milk.
- The inability to satisfy nutrition information and nutrition education needs of the public coupled with inadequate health instruction and follow-up concerning all aspects of feeding the young. The emphasis should be on the need for continuity of care and consistency of information and support.
- Professional and official personnel responsible for the feeding and care of infants and children frequently lack correct information as to nutritionally sound and economically feasible ways of feeding the young.
- The lack of research to obtain useful and valid information relating to infant and child feeding and overall health. Some specific concerns are related to the biomedical problems, others are related to socio-economic and cultural problems; such as: "What are general attitudes to breast-feeding?", "How and when are they formed?", "What are the sources of influence on a mother?", "What is the role of formula starter kits?", "How do training curricula deal with the subject?".

CONCERNS THAT APPLY TO COMMUNITIES IN SPECIFIC AREAS BOTH IN INDUSTRIAL AND DEVELOPING COUNTRIES

- The areas of poverty that make it impossible for millions of people to

obtain basic, minimum adequate nutrition with consequent hunger, malnutrition and starvation. This results in particular hardship for vulnerable groups such as pregnant and lactating women, infants and children.

- In some societies there is food discrimination against women (particularly pregnant and lactating women) and children because of food taboos. These taboos result in nutritional deprivation.
- In many industrialized countries there is much embarrassment about breast-feeding in public.
- Help, support, advice and encouragement for the nursing mother tends to be lacking in industrialized societies and in urban areas of developing countries.

RECOMMENDATIONS AND INITIATIVES TO BE SUPPORTED POLICY

- Press for a national food and nutrition policy in Canada to be developed by appropriate agencies (such as Agriculture Canada, Health and Welfare Canada, Consumer and Corporate Affairs Canada and Industry, Trade, and Commerce) that incorporate infant and child feeding as a component part of the overall food and nutrition policy. Recognition and encouragement should be given to similar initiatives in other countries.
- Encourage related professional associations (e.g., medical, nursing, dietetic) to jointly develop infant and child feeding guidelines so that professional advice is in accord.
- Work towards influencing hospital obstetric wards to permit a climate which favors breast-feeding.
- The composition of infant formulas and infant foods, as well as the public education programs of the manufacturers should be monitored by government.
- Incorporate weaning food and supplementary feeding policy into health and nutrition strategy.
- Employers should adjust policies to make it easier for working women to breast-feed their infants. Maternity leaves of adequate duration, nurseries and day-care centers are important issues to be supported.
- Promote research to obtain useful and valid information relating to infant and child feeding and overall health.

PUBLIC EDUCATION

- Departments of Health together with appropriate professional associations and supported by media campaigns should inform parents of the advantages and techniques of breast-feeding. Literature on the subject should be kept current and distributed through hospitals, clinics and physicians' offices.
- Public programs should be promoted to inform the public that the primary role of the breast is lacteal function. "Breast is best for baby" and a comfortable climate of acceptance should be provided to make breast-feeding possible at all times.
- Information about feeding the very young should be an integral part of all training programs from kindergarten to matriculation.
 - curricula should be reviewed to permit a positive appreciation of a lifestyle that approves breast-feeding.
 - schools should make practical application of the principles of good nutrition by making available only nutritious foods on school premises.
 - textbooks should be revised to treat the subject in adequate detail.
 - health professionals should be educated in food and nutrition strategy.
- Recognition and encouragement should be given to self-help groups such as La Leche League International that distribute information about successful breast-feeding and are committed to influencing governments, medicine, industry and the lay public to increase an awareness of the value of breast-feeding.

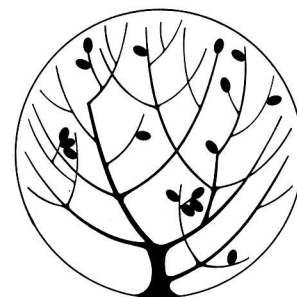
- Encourage in-hospital teaching about infant feeding and other aspects of infant care by qualified counsellors for mothers of newborn infants.●

REFERENCES

- Bacon, C. J. and J. M. Wylie. Mother's attitude to breastfeeding at Newcastle Hospital, Summer, 1975. *Br. Med. J.* 1: 308-9, 1976.
- Baumslag, A., and E. Sabin. The Marketing and Promotion of Infant Formula in Developing Countries: Notes on a Senate Hearing. July 6, 1978.
- Behar, Moises. Nutrition and Child Health — World Health Day 1979, International Year of the Child 1979. World Health Organization.
- Berg, A. *The Nutrition Factor*. Washington, D.C., Brookings Institute, 1973, pp. 89-106.
- Breast-Feeding: What is Left Besides the Poetry? A Statement by the Nutrition Committee, Canadian Paediatric Society, Canadian Journal of Public Health, Vol. 69, January-February, 1978.
- Citizens Committee on Infant Nutrition. White paper on "Infant Feeding Practices." Washington, D.C., Centre for Science in the Public Interest, Dec., 1974.
- Davies, D.P. and C. Thomas. Why do women stop breastfeeding? *Lancet* 1: 420-1, 1976.
- Eastham, E., D. Smith, D. Poole, et al. Further decline of breastfeeding. *Br. Med. J.* 1: 305-7, 1976.
- Fomon, S. J. Infant Nutrition. Philadelphia. W. B. Saunders, 2nd Ed., 1974, pp. 20-23.
- Fomon, S. J. and T. A. Anderson. Practices of low income families in feeding infants and small children with particular attention to cultural subgroups. Maternal and Child Health Service. Publ. #725605. Washington, D.C., 1972.
- Gerrard, J. M. Breastfeeding: Second thoughts. *Pediatrics* 54: 757-64, 1974.
- Gerrard, J.W., J.W. MacKenzie, W. Glouboff, J.Z. Garson and C. S. Maningas. Cow's milk allergy: Prevalence and manifestations in an unselected series of newborns. *Acta Paediatr. Scand. Suppl.* 234: 1-21, 1973.
- Gyorgy, P. The uniqueness of human milk — biochemical aspects. *Am. J. Clin. Nutr.* 24: 970-5, 1971.
- Health and Welfare Canada. Nutrition Canada Provincial, Indian, and Eskimo Surveys. Ottawa, Canada, 1975, 184 pp.
- Health and Welfare Canada. Dietary Standard for Canada. Ottawa, Canada, 1975, p. 59.
- Infant Nutrition (A Guide for Health Professionals). Saskatchewan Department of Health. 1978.
- Jelliffe, D. B. and E. F. P. Jelliffe. Human Milk in the Modern World — Psycho-Social, Nutritional, and Economic Significance. Oxford University Press, 1978.
- Jelliffe, D. B. and E. F. P. Jelliffe. Doulas, confidence, and the science of lactation. *J. Pediatr.* 84: 462-4, 1974.
- Jenner, Alice. Food: Fact and Folklore. McClelland and Stewart. Reprinted, 1979.
- Ladas, A. K. How to help mothers breastfeed. *Clin. Pediatr.* 9: 702-5, 1970.
- La Leche League in Canada. 490 Briar Hill Avenue, Toronto, Ontario, Canada M5N 1M7.
- Latham, M. C. Nutrition and infection in national development. *Science* 188: 561-5, 1975.
- Lindquist, B. Standards and indications for industrially produced infant formulas. *Acta Paediatr. Scand.* 64: 677-83, 1975.
- Lonnenderdal, B., E. Forsum, and L. Hambraeus. The protein content of human milk. I. A transversal study of Swedish normal material. *Nutr. Reps. Int.* 13: 125-34, 1976.
- Lowenberg, M. E. et al. Food and Man. New York, John Wiley and Sons Inc., 1968, p. 176.
- Myres, A. W. Every baby deserves the breast. *Canadian Consumer*, February, 1979.
- Myres, A. W. Promoting breast-feeding. *Health Education*, January, 1979.
- Myres, A. W. Personal Correspondence, March, 1979.
- Nutrition Reviews: A Special Number Marking the Eightieth Year of Cecily D. Williams, November, 1973.
- Raiha, N. C. R., K. Heinonen, D. K. Rassin, G. E. Gaul. Milk protein quality and quantity in low birth weight infants. I. Metabolic responses and effects on growth. *Pediatrics* 57: 659-84, 1976.
- Ritchie, Jean A. S. Learning Better Nutrition. United Nations Food and Agriculture Organization, 1967. p. 65.
- The Feeding of the Very Young: An Approach to Determination of Policies. A Report of the International Advisory Group On Infant and Child Feeding to the Nutrition Foundation. October, 1978.
- Thompson, M. The convenience of breastfeeding. *Am. J. Clin. Nutr.* 24: 991-2, 1971.
- Vahlquist, B. New knowledge concerning the biological properties of human milk. *Bull. Int. Ped. Assoc.* 4: 18, 1975.
- Weichert, C. Breastfeeding: First thoughts. *Pediatrics* 56: 987-90, 1975.
- Williams, Sue Rodwell. *Nutrition and Diet Therapy*. St. Louis, Missouri, C. V. Mosby Company, 1979, p. 246.

A child is a person who is going to carry on what you have started. He is going to sit where you are sitting, and when you are gone, attend to those things which you think are important. You may adopt all the policies you please; but how they are carried out depends on him. He will assume control of your cities, states and nations. He is going to move in and take over your churches, schools, universities and corporations. All your books are going to be judged, praised or condemned by him. The fate of humanity is in his hands.

Abraham Lincoln



Sharing Your Skills

Maureen Johnson
Information Officer
Public Affairs CUSO



Courtesy of Karin Holst

Introducing Palm Oil at an Agricultural Field Day in Papua New Guinea

HOME economist Dolores Sawatsky was in her last year at the University of British Columbia when she and her husband, a civil engineer, decided that work overseas might give them a better perspective on cultural values before they settled down to practice their respective professions in Canada.

Paulette Faryna, who grew up on a Manitoba farm and now lives in Edmonton, decided to travel after graduating from the University of Manitoba — the first student to obtain a master of science degree in foods and marketing given jointly by the faculties of home economics and commerce. She spent nine months in Europe, Morocco and the Middle East, then returned to Canada having resolved to go one day to Africa, India or South America to work. Three years later she realized that dream.

Both Dolores and Paulette applied to CUSO (the Canadian University Service Overseas) and soon afterwards found themselves in Africa. Dolores was appointed a lecturer at Njala University College in Sierra Leone, while Paulette was posted to Kaduna State, Nigeria, for two years to work on a soybean popularization program, devising recipes and teaching cooking methods; she worked as a liaison officer between

Ahmadu Bello University, the largest university serving the 10 northern Nigerian states, and the government home economics extension workers.

Like all CUSO volunteers, Dolores and Paulette had their travel costs, along with medical and life insurance, paid by CUSO. They took an orientation course before leaving for Africa to give them some idea of the culture and lifestyle they would be entering and what problems they might encounter.

CUSO volunteers are paid by the host government at local rates, so salaries are well below Canadian levels. However, they provide a reasonable standard of living and most volunteers manage to save enough for some travelling. Housing is generally provided free or is subsidized, and volunteers receive a settling-in allowance and a re-settlement allowance once they return to Canada.

CUSO was formed back in 1961 to act as a co-ordinating agency for various groups sending Canadian volunteers overseas. In the past 18 years, this independent organization has recruited more than 6,000 volunteers to fill manpower gaps in developing countries for two-year periods. At first, recruits were mainly

young teachers. Today, CUSO recruits people of all ages (some volunteers are in their 70's) and also accepts family applications, particularly if both adults can be placed. Over the years the needs of developing countries have also changed and today more and more governments are requesting people skilled in trades, agriculture, home economics, appropriate technology and business as well as medical and teaching personnel.

Most CUSO postings have a teaching component, either in a classroom situation or on-the-job. The aim is to pass on skills so that one day expatriate personnel will no longer be needed.

NJALA College, where Dolores was posted, is part of the University of Sierra Leone and was set up in 1964 to train agriculturalists and secondary school teachers. The college, which draws its students from various African countries, offers two-year certificate and four-year degree programs in both agriculture and education, though when Dolores was there the effectiveness of the programs was limited to some extent by lack of sufficient operating funds.

Most of her students in the degree program were taking an education option; the remainder were studying for

a general degree to prepare them for extension work. Enrolment, for the past few years, has been small, between five and ten students. The government however, is interested in training more students, particularly to teach in secondary schools.

Dolores not only lectured but also supervised student projects and, to gain a better understanding of some of the problems faced in a developing country, she spent some time visiting local villagers.

"A highlight of the last college term was the food processing course", she remembers. "We developed jam and marmalade recipes and produced products from local fruits which sold well with the college population. As a result, we set up a small jam-making industry which was a bonus for the department as money was always in short supply for teaching materials."

Dolores and her husband arrived in Sierra Leone during the rainy season. "Although we come from a wet climate (the Fraser Valley), we were not well-conditioned to the torrential rains of Sierra Leone", she says.

"Freetown is a port city with a unique atmosphere. There are a few modern buildings but most structures are very old, some deteriorating. The shops are managed mostly by Lebanese immigrants, and Sierra Leonean traders line the sidewalks displaying their wares — cutlery, clothes pins, hangers, mirrors and cigarettes — while pedlars walk the streets aggressively trying to sell inexpensive watches, pens, plastic bags and materials."

AT first, the Sawatskys were overcome by the differences but soon found that their lifestyle adjusted. Instead of driving a car, they used a motorcycle. Instead of potatoes, they ate rice as a staple food. Instead of living in an apartment, they lived in a small, prefabricated house with a large garden. Running a household was different: everything had to be done by hand, including the washing, and there was no nearby supermarket. Food had to be bought from different traders or in the local market where bargaining was commonplace.

They adjusted to the slower pace of life and got used to arriving a little late for dinner engagements and other appointments, and chatting a while before getting down to any business transactions.

Dolores' husband found engineering a challenge: he had to consider the limitations, the priorities and the resources available — the lack of capital, the abundance of manpower, the level of knowledge of the people concerned and the importance of traditional patterns among the cultural groups.

The couple found life was never dull. They were without electricity for a whole month while the generator was being repaired, and then lived through a water shortage.

But, she agrees, all in all their time overseas was most rewarding. "We have been able to appreciate a new way of life, and our travel to other West African countries during our vacations has given us a full variety of experiences which we will never forget."

WHEN Paulette left Canada three years ago for Nigeria she'd never seen a soybean. Now she probably knows all there is to know about them. Her work involved travel to the villages with extension workers to demonstrate soybean cooking by traditional methods — using three stones, wood for kindling and a clay pot.

The traditional weaning food, *ogi*, made from maize, is being enriched with soybeans and promoted as Soyogi. There are also plans to set up a soybean processing mill as growers are finding that marketing is a problem, and work is being done on a composite flour which includes soybeans.

Paulette was concerned with promoting soybeans at the village level, encouraging their use in meals and snacks and as a substitute for other foods to provide a cheap, high-protein diet.

CUSO is currently looking for a home economics extension worker to continue the soybean popularization program. The volunteer will be based in Zaria, a few kilometers from the main campus of Ahmadu Bello University, and will travel extensively throughout northern Nigeria.

ANOTHER West African country, The Gambia, is also looking for home economists to work in supervisory capacities. Two program officers are needed for the Women's Village Program — part of a large project covering half The Gambia and aimed at

increasing the living standard of farming families in rural areas.

The main objective of the women's program is to increase rice production (rice is traditionally grown by the women) and to establish "credit worthiness" among women's groups through the formation of savings societies. Again, the volunteer will spend a great deal of time travelling.

CUSO also has openings in Malaysia and Papua New Guinea, for home economists. The agriculture department in Sabah, a state on the northern tip of Borneo in Malaysia, is looking for an experienced home economist/extension worker to conduct refresher courses for home demonstrators and evaluate a program designed to improve the nutritional status, health and sanitation of rural people. And an agricultural college in Papua New Guinea, wants a home economist to teach rural development — a course aimed at providing a more comprehensive extension service to respond to increasing malnutrition, uncontrolled spending of money and the various social problems accompanying agricultural and economic development in many rural areas.

Judy Sasges, a home economist who was a CUSO volunteer in the mid-seventies, wrote home during her three years as an extension worker in Papua New Guinea: "It is hard to know just how much of what we try to teach is absorbed and attempted by the majority of the women. Occasionally though we get a woman like Sele at Adauwi who is always clean and neat, whose baby is fat and healthy and who asks questions to make sure she understands. Women like her make the work worthwhile despite the bad weather, smokey resthouses, fleas and other frustrations. After a week of teaching, talking and demonstrating you wonder if anyone listened, and then someone brings your pineapples and pawpaw as a thank-you at the end of the week . . . the women of Papua New Guinea have a tremendous job ahead of them, raising the children of today to be the leaders of this country as it starts on the road of life as an independent nation." •

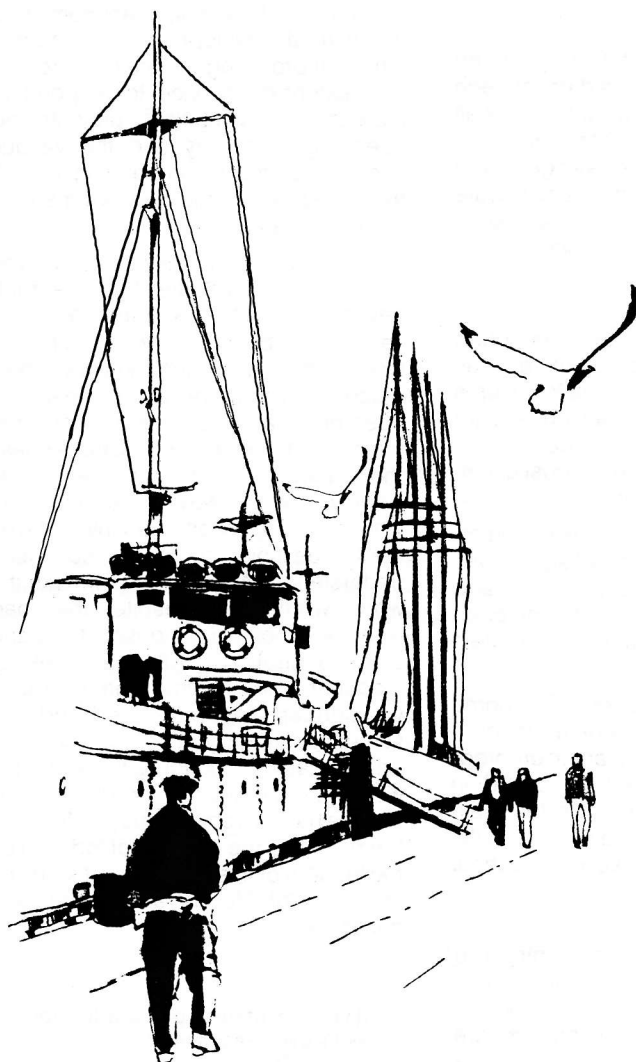
If you are interested in sharing your skills overseas, write to:

CUSO
151 Slater Street
Ottawa, Ontario K1P 5H5

TOWARDS 1984

HIGHLIGHTS of the CHEA National Conference St. John's, Newfoundland

Warm, friendly, and very successful best describe this year's CHEA Annual Conference in St. John's, Newfoundland. Approximately 340 attended the four days of workshops and sessions. What follows is an overview of some of the many highlights.



Special thanks to Phyllis Soldan, Edmonton, for her help with this review.

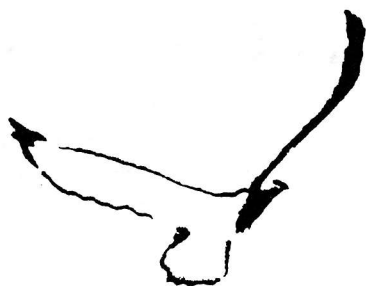


An Orange, An Egg, and a Glass of Milk

"Blue ribbon babies" was a recurring phrase when Agnes Higgins, Executive Director of the Montreal Diet Dispensary, spoke about her technique of counselling pregnant mothers. Part of her technique is to have these mothers mark "B" for baby on extra milk containers for the unborn and to encourage pregnant mothers to drink it up for "the baby" at intervals during the day. According to Agnes Higgins:

We have the mother feeling guilty if she doesn't feed the baby and the rest of the family would think twice before asking for the baby's milk. This is very important as it has been observed in other programs that the pregnant mother was sharing her milk supplement with other members of the family.

Counselling and supervision are all part of the program at the Montreal Diet Dispensary. A film clip graphically illustrated the point about the effects of poor nutrition and the importance of rehabilitation during pregnancy where there is evidence of undernutrition, underweight, and nutritional stress. Lest you think she drew her most graphic example from a developing country — think again. She was talking about pregnant Canadian women. She reiterated some of the points made earlier by the keynote speakers Margaret and Arthur Wynn. They, too, stressed the sometimes irreparable damaging effects to the child that can result from poor nutrition during pregnancy.



Winds of Change: A Seafood Symposium

Cod and salmon were once considered the only edible salt water fish but now squid, kaplan, turbot and various others are becoming popular. Consumer awareness about fish and seafood is increasing, but for those in the fishing industry, not enough. The average citizen eats more carrots, bananas and citrus fruit than fish, spokesmen said. "Is this because the average person at home doesn't know how to prepare, debone or get rid of odors?" was the question raised. The fishing industry would like to see the world convinced that "fish is a beautiful food to sink your teeth into."

A "Fisheries and Oceans" kit with booklets on preparing seafood was handed out. These are available, free of charge, from the various Maritime Fisheries Departments. Participants were very interested in the specific preparation ideas and facts about various seafoods.

Self Concept in Women Heads of One-Parent Families: The Changing Family

Because the literature suggests that one-parent families tend to suffer from deprivation in several areas — financial, social and emotional, and that women are more affected than men, a study was undertaken to see the effect the one-parent family situation had on the self concept of women who were one-parent family heads. According to the results reported by Elizabeth Newlands, Director of Social Work at the General Hospital in St. John's, single parent women felt less satisfied with their family lives than married women, and by inference had a low opinion of themselves as adequate people. Interest was expressed in the develop-

ment of a more complete program of social services for single parents, a program that would take emotional factors into consideration as well as providing for material needs. Along with the suggestions for services such as day care and adequate standard of financial care came the idea of the educational need for the development of techniques for coping with everyday problems in very practical ways. Decision-making in financial matters by oneself was just one of the many problem issues suggested.

Judy Adler put the changing family into historical perspective by suggesting that the dilemma of the employed mother was historically greater during the Industrial Revolution. Judy, a sociologist at Memorial University, suggested that to think that women are facing some new dilemma now in the 1970's is to overlook the problem from a historical perspective.

Much More

One of the workshops that proved very popular was the one on textile arts. An hour with Colleen Lynch, an artist and craft design specialist with the Department of Rural Development, had everyone set to go home to take a new look at those old hooked rugs from a historic design point of view. The session on duffle was well received. By this time next year there should be some members with a real knack for creating in duffle.

Research Reports

We hope more of the research reports given at the conference will surface in the Journal as articles this year. Papers were given by Michelle Marcotte, *Toronto Home Canning Review* (article on page 187 of this issue); Lynda Clark, *A survey of Infant Feeding Practices in Manitoba*; Pat Giovannetti and O. Moase, *Evaluation of Soy Products by Young Healthy University Women Participating in a Metabolic Study*; and Wanda Young, *Communication Competencies for Home Economics Graduates*.

A Final Note

The conference was most enjoyable and rewarding. From the lobster boil at Quidi Vidi to the research papers on the final day, it was great fun and food for thought, all in one. Congratulations Newfoundland. ●

*I bows towards ya,
I nods accordin',
I catches your eye,
—and I smiles.*

*A Newfoundland Greeting
Courtesy of Mora Busby,
St. John's, Newfoundland*

Abstracts of Current Literature

Submitted by
Faculty of Home Economics
University of Manitoba

Social Psychological (Mis) Representations in Television Advertising

T.E. Shimp
Summer 1979
The Journal of Consumer Affairs,
13(1), 28-40.

With the consumer movement as catalyst, there recently have been significant developments in the regulation of business activity. Improvements notwithstanding, major obstacles remain which prevent consumers from attaining their rights to be informed. Perhaps the biggest hurdle is in the area of advertising deception. Though the use of the unconscionable lie in advertising has been reduced substantially, subtle forms of deception remain "alive and well." Advertising messages are replete with opinions, superlatives, and other means of exaggerating product quality.

This article develops a formal argument that demonstrates why social-psychological representations do indeed possess the potential to deceive. Results are presented from an extensive content analysis of television commercials which show that the majority of T.V. commercials rely heavily upon social-psychological representations.

To develop a case against social-psychological representations (hereafter, SPRs), this paper examines the nature of advertising language. With this background it proceeds to assess the manner in which receivers extract meaning from advertising messages; the deceptive potential of SPRs is then examined in this context. Content analysis was used to analyze the sample commercials' content. Fifty commercials from the full sample of 293 (from the national advertising office of FTC's file) were used for typology construction and pre-testing.

The research results demonstrated that the advertising claims used to promote a variety of products are predominantly social-psychological rep-

resentations. This practice is attributable, presumably, to at least two factors. First, some advertisers have no objective basis for differentiating their brands from competitors' brands, so they resort to the use of vague, subjective language as the means of having receivers draw their own inferences about what the advertised brand has or what it will do to them.

A second plausible reason for the extensive use of SPRs is that this type of advertising is not readily challengeable by self-regulatory bodies. By comparison, non-social-psychological advertising, which involves claims concerning objective product features or benefits is much more prone to challenge because regulators can specify concrete features of the advertisement which the advertiser must substantiate.

Tahira Hira

Premature Birth: Consequences for the parent-infant relationship.

S. Goldberg
1979

American Scientist, 67(2), 214-220

Goldberg reviewed studies on parent-infant interaction with preterm infants, and placed them into a theoretical framework. The behavior of both parents and newborns appears to be programmed so that interaction between them normally occurs. Both parents and infants initiate and respond in this interaction. The literature suggests an intrinsic motivation to be competent. Infants feel competent when they can control parental behaviors, when a cry brings help or a smile brings continued social interaction. Parents feel competent when their response to a cry is effective or when attention results from social initiatives. Parents of preterm infants are less likely to have opportunities to become skilled interactive partners.

Infants vary in how readable, predictable, and responsive they are. The more readable, predictable and responsive infant likely receives more prompt and efficient response to his cries or other social initiatives. Parents and infants both build a series of successful interchanges with the more readable, predictable and responsive infants. Some literature suggests that preterm infants may be less readable, predictable or socially responsive. There is also considerable literature which suggests that extra stimulation of preterm infants assists development. Parents of preterm infants thus tend to try very hard to elicit responses from them. It may be that this attempt is not only unsuccessful but may even interfere with the interactive process, causing stress. The data are, as yet, not sufficient to indicate the duration of differences between fullterm and preterm infants. One must also take into account the fact that prematurity is more frequent in high risk parental groups, and thus the differences may be the result of other environmental factors.

Lola Jackson

Are Low-Cholesterol Diets Expensive?

L.W. Scott, J.P. Joreyt, J. Young, R. Reeves, M.P. O'Malley and A.M. Gotto,

1979

Journal of the American Dietetic Association, 74:558.

The low-cholesterol diet plan used in the Diet Modification Clinic at the Methodist Hospital in Houston was costed for middle and low income clients. The diet plan is designed to control the total fat intake to 35 percent or less of caloric intake, to maintain the polyunsaturated to saturated fat ratio at

1:12, to restrict saturated fat to 10 percent of total calories, to increase polyunsaturated fat to 10% of total caloric intake and to restrict cholesterol to 300 mg daily. Menus were developed for a reference family from the food consumption data collected in the 1965 U.S. Dept. Agriculture Survey. These menus were modified to conform to the recommendations of the Clinic. The reference family included a husband and wife, 20 to 54 years of age, and two children, 6 to 8 and 12 to 14 years of age. Food items in the moderate cost menus were priced at two supermarkets and low cost menus were priced at a local chain supermarket in a low-income neighborhood. The cost of the fat controlled menus did not differ significantly from the menus derived from U.S. survey data, therefore it was concluded that the dietary recommendations which may be followed for heart disease prevention do not increase food bills. This may be attributed to a decrease in meat purchases, convenience foods and high-fat snack foods.

Vivian M. Bruce

Ascorbic Acid in Peas Cooked by Microwaves

L.B. Mabesa, R.E. Baldwin
1979

Journal of Food Science, 44: 932-933.

Due to its sensitivity to handling and storage conditions, retention of ascorbic acid in frozen peas is an appropriate objective test for quality. The final level of ascorbic acid in peas will be dependent upon the cooking procedure. Conflicting results have been reported concerning the effects of conventional and microwave heating on ascorbic acid in vegetables. Because of the lack of agreement, a study was conducted to investigate the effects of cooking frozen peas with and without water in a domestic microwave oven (115V, 550 watts cooking power) and in an institutional microwave oven (220V, 1150 watts cooking power).

Ascorbic acid retention in the conventionally cooked sample was 71.4% (cooked for 8 minutes). The retention in the microwave cooked samples ranged from 72.19 to 100.96% depending on the type of oven, length of cooking and amount of water added. With the exception of the "MW-155V and water" cooking procedure, peas cooked by microwave were significantly ($p < 0.05$)

higher in ascorbic acid content than peas cooked by the conventional procedure. Peas with added water cooked in both microwave ovens contained significantly less ascorbic acid than their counterparts cooked with water.

Based on the above results, it appears that waterless cooking in a domestic microwave oven can produce peas with high ascorbic acid content. If water is added, however, ascorbic acid retention may be no better than if one cooked the peas by a conventional method.

Mina R. McDaniel

Clothing and Related Needs of Physically Handicapped Persons

Elizabeth Shannon and Naomi Reich, Ph.D.

January, 1979

Rehabilitation Literature, 40(1): 2-6

This is an exploratory study to categorize the common physical limitations of the physically handicapped so their clothing and daily living needs can be explained to manufacturers, educators, retailers, professionals and paraprofessionals.

A total sample of 278 employable male and female respondents were used for the study. Respondents suffer from either arthritis, poliomyelitis and spinal cord injury or from resulting disabilities of nerve damage or visual impairment.

Although difficulty was indicated by most women respondents with the use of jackets, cardigans, coats, two-piece outfits, i.e., blouse and pants or slacks, they showed strong preference for these apparel items. Dresses without waistlines presented fewer problems, but the use of back closures presented great difficulty to 80% of the women respondents. This was true with brasieres as well. Sources of dressing difficulties indicated were the type and location of closures; pulled up garments as slacks, girdles and hosiery; pulled down garments as blouses and dresses that are pulled on over the head.

Compared to their female counterparts, male respondents did not encounter as many difficulties in dressing, however, some indicated difficulty with the one-piece pull up garments, socks and long johns as well as pull on shirt styles.

Design features chosen by both sexes were: lowered and suitable neckline, front opening; adjustable and elastic waistband, velcro and large snaps. Women respondents also indicated preference for enlarged armhole and short or kimono sleeves.

Strong preference was indicated for light weight and double knits, light and medium weight woven fabrics and cotton and polyester blends. Fiber content preferences in order of choice are 100% cotton, 100% polyester and 100% nylon. Machine washable and dryable with no ironing are the care characteristics desired by most respondents.

Cecilia A. Gonzales

The Physical Properties that Influence the Drape of Knitted Fabrics

Marian Gaucher, M.Sc.

April, 1979

*Unpublished Thesis, Clothing and Textiles Department
University of Manitoba*

The research investigated certain deformation properties and certain geometric characteristics in order to determine the best predictors of the drape coefficient of knitted fabrics. The deformation properties included stiffness, shear, and extensibility, while the geometric characteristics included weight, thickness and density. The measurements obtained were bending length, secondary shear modulus, extension at a 100 gram load, fabric weight, fabric thickness, and fabric density.

Multiple linear regression statistical analysis was performed and several predictor equations were developed. The variable that predicted the drape coefficient varied according to the knit structure. For all knit group, the best predictor variables were bending length, thickness, secondary shear modulus and transformations of these variables. Bending length, thickness and extension were the best predictor variables for the warp knit subgroup, while bending length and secondary shear modulus were the best predictor variables for the weft knit subgroup. ●

Cecilia A. Gonzales

CENTS OFF COUPONS

Though *cents-off* coupons are certainly not new, they seem to have seen a resurgence in the last few years. More than 1.5 billion coupons were distributed in Canada last year, so you've likely received and probably used a few of them. How does the couponing system actually work? How does the consumer benefit? How does it help the manufacturer?

Coupons are generally issued by a manufacturer or retailer and state a money value off a particular service or a product. Coupons are issued in a number of ways. One kind comes to the consumer via a direct household mailing or "drop". Another is the media coupon found in newspapers and magazines. Another type can be found in a baby or bridal gift box. If you've ever received coupons in this way, you were part of a specific consumer group to which these coupons were directed. Coupons come in egg cartons, in or on product packages and from in-store handouts.

Coupons have been made available on hundreds of consumer products although they are issued mainly on food, household and toiletry products.

Why Do Manufacturer's Use Coupons?

Coupons can be used as complementary advertising to other promotional activity for new products or re-introductions of improved products. The cent's off value encourages consumers to try these items.

As well as promoting trial purchase, coupons can encourage repeat purchases. They help combat competitive promotion and increase sales so that production costs can be maintained at economical levels.

How Do Coupons Work?

When the manufacturer decides to issue coupons, a redemption or "clearing house" is hired to handle them. Two such Canadian Houses are A.C. Nielsen Company and Herbert A. Watts. Once the coupon is redeemed at store level, the retailer submits it to the clearing house. The clearing house records the total face value of the coupons submitted for that manufacturer's product and sends the retailer a cheque for that value, plus a handling fee.

Expensive? In some ways couponing can be expensive for the manufacturer but, if used successfully, it can and does build volume sales for the product.

Consumers Like Coupons

Coupon distribution more than doubled between 1973 and 1977. At the same time, redemption tripled.

One study, which used a sample of 2000 consumers was conducted by A.C. Nielsen Company. It showed that in that four year period, the number of coupon users increased by 29%. More than half of all Canadian households now use coupons frequently and in fact, 58% of coupon users said they wanted more coupons. The use of coupons seems to be a marketing tool which consumers highly endorse.

For consumers, there are two major benefits: increased awareness of new products and more importantly, direct savings on new or existing products.

In the Nielsen study, it was found that of the 28% non-users only 1% were against coupons on principle. Twenty-seven percent gave reasons like these for not using coupons: "not interested", "forget to take them shopping", "not on brand or sizes bought regularly". The last reason was given by 2% of the non-users. Interestingly, of the coupons reported, 64% were redeemed on brands bought regularly and 36% were used on a brand other than regular brands.

The Consumers' Association of Canada does not fully endorse any marketing tool but does recommend consumers take advantage of coupons if they can be used to purchase products normally used by the consumer and are not used to buy impulsively.

Some retailers have established in-store coupon "swap" tables where consumers can trade coupons for ones which they feel they can better use. Estimations are that the average household can save in excess of \$50.00 a year with the use of coupons.

Couponing is definitely here to stay. It's a way for the manufacturer to promote his product, and it's a way for the consumer to save directly on favorite brands. Consumers are using coupons more and more, and no doubt manufacturers will continue to offer more and more coupons.

Resource: *Liaison* Robin Hood Multifoods Limited Newsletter, June 1979.

METRICS

Consumer and Corporate Affairs Canada has set cut-off dates for conversion of the home furnishings market to the metric system. Beginning December 31, 1979, advertisements for floor coverings, draperies, furniture, furniture coverings, towels, and wallpaper must be expressed in metric units as well as in conventional English measurements; after December 31, 1980, only metric units can be used.

CONVECTION OVENS

Restaurants and institutional kitchens have been using the principle of convection heating for over 30 years. As one manufacturer of a convection oven stated "It's the newest . . . old idea in kitchen cooking appliances to come along in years".

In a conventional oven, hot air remains motionless. In a convection oven, the hot air is continuously circulated by a fan which removes the cold air around food and replaces it with moving heated air. Though convection ovens are available in some ranges (Jenn-Air, Tappan) the latest convection ovens on the market are small and portable.

What Are the Advantages?

Promotion of these ovens is being made on the basis of their time and energy saving advantages. Because the oven

heat is conveyed to the food more rapidly than in a conventional oven, food cooks faster and at a lower temperature. Time to cook is claimed to be about $\frac{1}{3}$ less than a conventional oven. Temperatures can be reduced by 25 to 50 degrees fahrenheit. No preheating of the oven is required.

Although these ovens appear small, it is claimed that "you can literally stuff the oven full". Because the air is moving and the temperature is the same in all parts of the oven, everything cooks evenly. The convection oven is a kind of rotisserie in reverse. "It turns the heat, not the meat".

Convection ovens are claimed to be the ideal solution to a working woman with a large family. They cook meals more quickly than a conventional oven, quantity is not a restraint as in the microwave oven and the final product is closer to products cooked in a conventional oven.

What Brands Are Available?

The Rival Manufacturing Company, Kansas City, Missouri plans to introduce their convection oven this fall. It should retail for about \$249-U.S. It's portable, table top and weighs 35 pounds. Its oven capacity is about 1.1 cubic feet.

The Cuisinart Air Surge Oven is an uniquely designed, almost clear glass oven weighing less than 15 pounds. Its size is 16" wide, by 14½" deep and 13" high. It can be mounted on a wall, or placed on a tabletop, and uses an ordinary 110 volt current source.

The Maxim Company of Newark, New Jersey, also manufacturers a portable convection oven with a suggested retail price of \$225.00. It's lightweight (20 pounds), has a continuous self cleaning interior and costs an average of 4¢ an hour to operate.

Other brands of convection ovens are likely already available. And more manufacturers will probably introduce convection ovens in the near future. It will take some time before an evaluation of the advantages and disadvantages of portable convection ovens will tell us if they meet a real need in our ever increasing "small appliance" oriented kitchen.

FOOD DEHYDRATORS

Food dehydrators are another relatively new small appliance that are bound to increase in availability. With an increased interest in food preservation of all types, dehydration of foods is also increasing in popularity. Economy, vitamin content, flavor, and easy storage are claimed to be some of the advantages of food dehydration.

Waring manufactures a compact food dehydrator that retails for about \$75.00. It dries five pounds of apples for 14¢, and is claimed to save up to $\frac{1}{3}$ the processing costs of canning or preserving. More information on the Waring food dehydrator can be obtained from: Waring Products Division, Dynamics Corporation of America, New Hartford, Connecticut 06057.

A larger food dehydrator is manufactured by Excalibur Products. It includes 17.2 square feet of drying area, and a feature to recirculate heated air for lower power usage. This dehydrator retails for about \$150 and information can be obtained from: Excalibur Products, 6083 Power Inn Road, SACRAMENTO, California 95824.

Kountry Kitchen Products is another source for food dehydrators. Their units retail for about \$140, and \$190. Information can be obtained from: Kountry Kitchen Products, 10534 - Cypress Avenue, RIVERSIDE, California 92505.

BE HEALTHY — BE HAPPY PUZZLE KIT

General Foods Kitchens are reintroducing their "Be Healthy - Be Happy Puzzle Kit" especially for consumers as a special International Year Of The Child project. Though this kit was originally designed for use by elementary school teachers, nutritionists and dietitians, the material is easily adaptable for in-home use.

The kit includes a 24" x 18" jig-saw puzzle plus a "Teaching Unit" giving key nutrition information, a "Color Me Healthy" coloring sheet and a copy of "You Are What You Eat".

The cost of the kit is free except for a 75¢ postal handling charge and can be obtained by writing to: Be Healthy - Be Happy Puzzle Kit, General Foods Kitchens, P.O. Box 4019, Terminal 'A', TORONTO, Ontario M5W 1J6.

BREAST-FEEDING TEACHING AID PACKET

The La Leche League feels that there may be a generation or two between breast-feeding mothers in today's families, so taking a look at the emotional, physical, and nutritional aspects of breast-feeding, in the classroom will offer tomorrow's parents a chance to explore the subject.

To meet this need a teaching packet has been prepared. The Packet includes a teacher's Breast-feeding Guide plus 25 copies of an 8-page booklet *Motherhood - A Great Beginning*, (for students) with sixteen other La Leche League publications (background material for the teacher).

Teachers may incorporate breast-feeding information into the class and/or invite La Leche League speakers to present the material to the class. (These speakers usually come with the best visual aid of all - a breast-feeding baby).

The Breast-feeding Teaching Aid Packet (No. 86) sells for \$4.00. Order from: La Leche League International, Inc.; Canadian Supply Depot, Box 39, WILLIAMSBURG, Ontario K0C 2H0.

FIRST SOLAR APARTMENT BUILDING

Canada's first apartment building heated entirely by solar heat was officially opened recently by the Ontario government.

The two-storey senior citizen's home, located in the southern Ontario town of Aylmer, has 29 one-bedroom units.

One of the main problems in using solar energy in Ontario is that less sunshine is available in the winter when it is needed most. But this building solves the problem by using an annual heat-storage system, which features a huge, underground insulated-concrete tank holding about 2,000 gallons of water.

Water from the tank is circulated through solar-collector panels on the south-facing roof, where it absorbs heat before returning to the tank. The water in the tank becomes quite hot by the end of the summer and gradually cools towards the end of winter as the building uses the stored heat. ●

Extra copies of the 40th Anniversary issue of the **Canadian Home Economics Journal** (vol. 29, No. 2.) are available for \$3.50 from the CHEA National Office, 151 Slater St., Ottawa K1P 5H3.

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Includes booklets on hard surface floor care, rug and carpet care,
teaching guide, Spirit Masters and printed originals
for learning projects, and product information sheets.

Our Home Care Kit:

Includes booklet on general home care
product information sheets, study guide and insect
identification chart with guide.

All booklets are bilingual. Allow 4-6 weeks for delivery.

Mail to:

Consumer Services Centre
S.C. Johnson and Son, Limited
P.O. Box 520,
Brantford, Ontario,
N3T 5R1

Number of kits required:

_____ Personal Care Kits
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_____ Floor Care Kits
_____ Home Care Kits

Name: _____

Address: _____

City: _____ Province: _____

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Johnson WAX



New Publications and Visuals

CURRENT CONSUMER

Teachers of consumer education may be interested in this monthly magazine geared for classroom use. Each issue contains a special focus article on such topics as diets, energy, life insurance, or the food supply. Other monthly features include articles on the marketplace, money management and consumer law. Also included are consumer-related puzzles, games and cartoons. Though the orientation is on United States laws and issues, it would be a good resource to add some interest and variety to the classroom.

In Canada, subscriptions are \$4.00 per year per student for nine issues, May to September. They have a minimum requirement of 15 subscriptions to one address. For more information on *Current Consumer*, and other student oriented magazines, such as *Current Lifestudies* and *Current Energy and Ecology*, write to:

Curriculum Innovations, Inc.
501 Lake Forest Avenue
HIGHWOOD, Illinois 60040

L'UNE DE NOUS PUBLIE

Nous sommes heureuses de vous faire part du lancement de trois documents rédigés par Henriette Le Hir, ex-présidente de l'Association des Diplômés en Economie familiale de 1973 à 1975, le 8 mai dernier à la Commission des Ecoles catholiques de Montréal. Ces documents ont été publiés en janvier dernier par le M.E.Q.

En septembre 1977 Henriette Le Hir, du Service des projets éducatifs de la C.E.C.M., était chargée d'entreprendre, à la demande du ministère de l'Éducation, un relevé de différents projets pédagogiques novateurs réalisés par les écoles de la C.E.C.M.

Ces documents sont disponibles au ministère de l'Éducation, Gouvernement du Québec, et portent les titres suivants: Document no 6 L'enfant de quatre à douze ans et l'école

Document no 7 L'adolescent et l'école

Document no 8 L'enfant et les défis d'adaptation à l'école

ENERGIZE AT SUNRISE

Another nutrition teaching package is being introduced by Kellogg's. This is designed for grades K-6 and makes good nutrition interesting.

The whole package costs \$2.00 and may be obtained by sending a cheque or money order (made payable to Kellogg Company) to:

Kellogg's Breakfast Unit and Game
6700 Finch Avenue, West
REXDALE, Ontario M9W 5P2

LIAISON

Liaison is a newsletter published quarterly by Robin Hood Multifoods Ltd. It has been published since September 1977 with the intention of informing food editors, and trade and government home economists across Canada about Robin Hood products using subjects which are of interest to consumers. The information on *coupons* that's included in the "What's New" section of this issue is an example of the type of article found in *Liaison*.

To have your name added to the *Liaison* mailing list write to:

Consumer Relations Department
200 Consumers Road, Suite 502
WILLOWDALE, Ontario M2J 4R4

YOUR FINANCIAL PLAN

The Money Management Institute of the Household Finance Corporation has introduced another new book to their series. This book is entitled *Your Financial Plan*. It offers a simple and practical guide for managing money by detailing how to set up a financial plan, live within your income, spend more wisely and reach your financial goals.

Copies are 50¢ and may be obtained from the:

Money Management Institute
Household Finance Corporation of Canada
85 Bloor Street East, Toronto M4W 1B4

Home Economics: A Definition by Marjorie Brown and Beatrice Paolucci is available from the American Home Economics Association, 2010 Massachusetts Avenue, N.W., Washington, D.C. The 260 page report costs \$15 (members), \$18 (non-members).

Social Ecology — The Work of the Professional Home Economist is a video production, compiled from slides and a composite sound track. It illustrates many facets of the home economics profession: food production, textiles, education, marketing, safety and sanitation, nutrition, housing design, conservation of energy, economic trends, Third World involvement, corporate/political decisions, and future international and super-technology roles of the home economist.

It was produced by the Home Economics Course Union and the Students' Union of Ryerson Polytechnical Institute in coordination with the Association of Canadian Home Economics Students (ACHES) at the Ryerson Polytechnical Institute Media Centre. The most likely audiences for this production are professional home economists, current students of home economics and high school audiences who may wish to consider a career in home economics. This is NOT a commercial production, and can be used ONLY for education purposes. •

The cost is \$35. The production may be ordered from: "Social Ecology", c/o Home Economics Course Union, Room A62, 380 Victoria Street, Toronto M5B 1W7



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Pour plus de renseignements et un livret d'instructions gratuit, écrivez à:

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Mississauga, Ontario L4W 1E4

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Happenings

The ACHES Conference "Western Lifestyles and the Home Economist's Role" will be held in Saskatoon, January 9 to 11, 1980. **IFHE's XIV Congress** will be held in **Manila**, Philippines, July 20 to 25, 1980. **CHEA's Annual Conference** co-chaired by **Joan Finlayson** and **Leslie Henry** will take place July 28 to 30, 1980 in Saskatoon. The theme proposed is "Technology Yesterday, Today and Tomorrow."

Newfoundland HEA member, **Jocelyn Wood**, has been very involved in the establishment of Canarama, a community canning center in the Grand Falls area. The center will contain four large pressure cookers, a sterilizer, a steam kettle, a ten-gallon boiler, an electric juicer/pulper and a preparation area. Jocelyn will be training staff who will be on hand in the center to provide assistance to consumers and will also be conducting workshops on food safety.

On August 8-11, 1979, the **International Federation for Home Economics, Region of the Americas**, held its first meeting in Guatemala City. The meeting, co-sponsored by the Latin American Association of Family Educators, brought together home economists from Latin America, the Caribbean, the United States and Canada. The theme of the meeting was "Strengthening Programmes in Home Economics". IFHE is aiming at establishing linkages among home economists in the Americas, developing and strengthening programs in home economics, and clarifying the contribution of home economics to national and community development.

Margaret Arcus, School of Home Economics, University of British Columbia is the British Columbia — Alberta representative to the International Federation of Home Economics which meets in Manila in 1980. She replaces Dr. Edith Down.



Among the very nice *happenings* at the CHEA Conference in Newfoundland were the ever present, ever friendly and helpful guides. **Debbie Kean** and **Pauline Collins** of Newfoundland were just two of the many who helped make the Conference a success.

The **Association of College Professors of Textiles and Clothing** have scheduled their regional meetings for Denver, October 10-12 (Western Regional); Williamsburg, VA., October 24-27 (Eastern Regional); and Columbus, Ohio, October 24-26 (Central Regional).

Contemporary Trends: Implications for the Home Economist is in progress with sessions being held at various times during October. Topics include The Conserver Society, Energy Issues: Managing Scarce Resources; Advances in Science and Technology; The Personal Computer, and Ethical Issues. For further information contact Education Extension, The University of British Columbia, Vancouver, B.C. V6T 1W5.

The **British Columbia Home Economics Association** planned an "Okanagan in Harvest" tour in September. It was to include a tour of orchards, processing plants, cold storage facilities, local vineyards and a winery.

Margaret Murphy, Co-ordinator of Home Economics for the Vancouver School Board since 1966 retired this year. She was an active member of various professional associations including CHEA where she served as secretary from 1972 to 1974. As Co-ordinator of Home Economics Margaret Murphy had many proud moments. Seeing the introduction of co-educational home economics and industrial education at the grade seven and eight level in the Vancouver area was one of them.

Want to tour and earn credits at the same time? Mansfield State College is having a **Couture Fashion Tour to Paris** November 3-11. Janice M. Kennedy, Mansfield, PA 16933 is the contact person. The University of Delaware is planning a **European Study Tour** of Italy, Switzerland, France, Belgium and England, January 3-31, 1980. Frances W. Mayhew, Newark 19711 is a contact person.

The three **home economics associations in Quebec** that are affiliates of CHEA set up a Liaison Committee in 1975 to exchange ideas and discuss CHEA and IFHE concerns with each other and the provincial director. This has encouraged more interest at the local level and has improved communication. One current concern is the formation of a provincial association through merging Montreal Home Economics Association and the Quebec Association of Home Economics Educators. Regular meetings have been held to develop a proposed constitution which will be voted on this year at the respective annual meetings.

The **L'Association des Diplomes en Economie Familiale** is presently working on a change of name to L'Association des Specialistes en Economie Familiale; the diploma programs is no longer offered in Quebec.

(Continued on page 215)

BIBLIOGRAPHY OF SELECTED REFERENCES ON BEEF

by Zoe Ann Holmes. Chicago: The American Dietetic Association, 1978. 148 p paperback \$9.50.

This is a highly technical publication that would be of use to persons making an in depth study of beef.

It is an excellent guide to pre-computerized beef references. There are 276 annotated and 1063 unannotated references plus a key word index. The dietitian or person involved in food product development and processing will find the key word index useful in searching for beef studies on topics such as cooking methods, factors affecting acceptability (especially tenderness), nutritive value and bacteriology. Other beef studies cover composition, meat structure, meat handling, processing and marketing.

Because this reference guide reviews research before computer listings were made, it should be used in conjunction with a computer search of available information from retrievable computer systems to review literature published since 1970.

Reviewed by:
Patti Rathwell
Beef Information Centre, Calgary

RESOURCE KIT ON FOOD AND ETHNICITY. 200 p, \$15.

A University of Toronto coordinated team which included dietitians, nutritionists, a home economist, a teacher and an anthropologist developed this kit containing papers, bibliographies and other information on foods and food habits, recipes and nutrition, in a cross-cultural context and within specific cultural areas. Native North American, Phillipino, Chinese, Japanese, East Indian, Latin American, Spanish and Portuguese, Italian, and Middle Eastern groups are included.

The concept of this approach to assembling materials on specific topics appears to be a manageable and effective method of sharing mate-

rials with other professionals. The topic is one with which practising professionals should be involved. Alternate life styles must be studied and scientific information transmitted recognizing diverse cultural backgrounds. This kit is a good beginning.

There are many useful papers and bibliographies in the 200 page loose leaf binder. Of particular interest to this reviewer is the inclusion of information on foods such as dock, sorrel, lambsquarters, fish, flour and kelp, and the inclusion of an interesting section on the nutritional status of North American Indians.

A minor point to be corrected is the difficulty encountered locating specific materials. Perhaps there could be more clarity in the indexing and dividing of topics. As well this reviewer would have appreciated an introduction stating the background and purpose of the kit as well as an introduction to some of the materials included. Although the section on cultural groups is well divided, a more visible separation or pagination of the dividers would be appreciated.

This kit would be useful to teachers, nutritionists, dietitians and to anyone who is interested in information about foods, eating habits and food preferences of non Anglo non French North Americans. It would also provide excellent background material for further study of Canadian ethnic food habits. The binder may be ordered from: Child in the City, 455 Spadina Avenue, Toronto, M5S 2G8.

Reviewed by:
Beulah M. Barss, Calgary

THE ART OF COOKING FOR THE DIABETIC

by Katharine Middleton and Mary Abbott Hess, Pickering, Ont.: Beaverbrooks, 1978, \$12.95.

This is a nutritionally sound, well written cookbook by two professional nutritionists. One of the authors, Katharine Middleton, is a former Canadian, a distinguished alumnus of the University of Manitoba, and a charter member of CHEA.

The first 88 pages provide information regarding the newly revised American exchange system, basic exchange lists, supplemental exchange lists, shopping, label reading, travelling and exercise. Illness is not included.

An excellent selection of over 300 calculated and tested recipes is presented along with information for adapting these recipes for cholesterol and/or sodium restriction. The book includes all the traditional recipe sections with a special chapter on sauces and spreads.

The practicality of this book adapts itself to the everyday use by the person with diabetes. It is also most suitable as reference material for the health professional counselling diabetic patients. The authors should be highly commended for developing such an excellent book on creative cooking for diabetics.

Reviewed by:
Jean Smith,
General Hospital, Calgary

The Art of Cooking for the Diabetic is a very appealing, well presented and basically sound book, bridging the gap between scientific theory and wise food selection. The authors, Katharine Middleton and Mary Abbott Hess, have had many years experience as nutrition educators. As well, they have counselled diabetics singly and in groups. The highlight of the book is the practical approach — lots of useful tips that only come from people who have worked with such a diet modification for a long period of time. Katharine, a charter member of the Canadian Home Economics Association, is herself, a diabetic.

The book opens with clear and concise definitions of terms commonly used in the care and treatment of diabetes. It proceeds with sound and sought-for advice to the diabetic. Without doubt one of the most valuable sections of the book deals with "food exchanges" in each of the food groups. This, by far the most extensive list published, contains not only the regularly used ones but also "Supplementary Exchanges".

Consideration is given to the many situations of today's living, shopping, eating out, travelling, carrying brown bag lunches, in sports and other exercise. There is also advice concerning alcohol for the diabetic.

The recipes numbering 300 present a tremendous variety of foods in tune with today's eating patterns. The *made* dishes replacing main course meats must be considered in all phases and for many have replaced the simply calculated roast meat. Another valuable feature is that recipes are given in family amounts and carry nutritive values per serving.

An amazing amount of time and energy has gone into the compilation, testing and checking of all of this information. It is a book of great value, not only for the families of diabetics, but to those health workers counselling diabetics.

Reviewed by:
Jean Wenhardt,
Saskatoon.

VEGETARIAN MEAL-PLANNING GUIDE — A NEW WORLD OF EATING by Elizabeth Smith, Winnipeg, Manitoba: Hyperion Press, 1979. 104 p \$5.95

Elizabeth Smith's book *Vegetarian Meal-Planning Guide* is an excellent guide. In it, she makes no attempts to sell vegetarian diets, but offers sound nutritional advice to those who have already chosen to try eliminating meat from their diet. The book is easy to read and understand. Dr. Smith has illustrated her topic well with tables and colorful charts.

The Guide is divided into three parts. Part 1 offers an easy-to-follow "Food World." This is an attractive alternative to the standard Canada's Food Guide. It illustrates what foods we should eat, and in what amounts each day. Dr. Smith also explains lacto-ova vegetarianism and why it is important that we include milk and eggs in the meatless diet. Serving sizes, sample menus, and tips on planning interesting, yet nutritious meals are offered.

Part II delves into nutrition in greater detail. Here, the author talks about the importance of calories and protein. She stresses that in Canada much of our population suffers from obesity, and thus justifies devoting several pages to the discussion of weight reduction. Also included is an excellent discus-

sion of protein: what it is, why and how much we need, and various sources of this nutrient. Part III concludes the book with a valuable collection of some of Dr. Smith's favorite meat-free recipes.

Dr. Smith says "Most people did not grow up on meat-free meals and therefore need a little help to master this new eating style." If the aim of the *Vegetarian Meal-Planning Guide* is to provide this help, then it has met its aim admirably.

Reviewed by:
Barbara Skinner,
Free-lance Nutritionist, Calgary

VEGETARIAN MEAL-PLANNING GUIDE FOR DIABETIC PERSONS by Elizabeth Smith. Winnipeg, Manitoba: Hyperion Press, 1979. 36 p, \$2.95.

Dr. Smith has applied her excellent knowledge of nutrition to the needs of both the vegetarian diet and the diabetic diet. The result is this booklet intended for any diabetic person who wishes to try meatless meals. The guide can be used to plan meals that the entire family will enjoy. It is easy to follow and is well illustrated.

Dr. Smith has again used the concept of a **Food World** presented in her *Vegetarian Meal-Planning Guide*. For the diabetic the Food World contains six food groups: dairy, fruit and vegetables, fats and oils, protein sources, and free vegetables.

This is followed by an *Eating Picture Chart* which shows at a glance the total daily servings from each food group, and the distribution of these servings throughout the day. Also presented are lists of common foods included in each food group. The liquid diet for days of illness has not been overlooked, but is offered in an easily understood chart. The second part of this booklet discusses the importance of protein and of the need to get an adequate quality of protein in the diet. As well, sample menus for the various calorie levels are provided. The *Vegetarian Meal-Planning Guide For Diabetic Persons* should prove useful to vegetarians on a diabetic diet.

Reviewed by:
Barbara Skinner,
Free-Lance Nutritionist, Calgary.

Happenings

(Continued from page 213)

Operation Alert is a innovative procedure established this year by the CHEA executive to enable members to react to social problems or issues by alerting the executive. The alerts are discussed by the executive and then forwarded to the appropriate committee for action when warranted. This not only gives members the opportunity of responding to national issues, but also provides our committees with an idea of the concerns of our members. A number of alerts have been received such as: the use of the Feingold diet by parents of hyperactive children, the need for research in the area of hyperactivity, the misuse of the term "nutritionist", the manufacture and sale of children's T-shirts with "psychologically damaging slogans", the widespread misunderstanding on the safety of microwave ovens, sexual discrimination, the philosophy of home economics. If you have a concern please send an "alert" to B. Baczynsky, 34 Linacre Road, Winnipeg, Man. R3T 3G6.

Cornell University is sponsoring a **Human Ecology Symposium: A Ten Year Anniversary Celebration**, November 8-10. If you are interested in more detail, contact Teresa Wagner, Ithaca, N.Y. 14850.

Verna Lefebvre and **Iva Bradley** have recently joined the Journal Committee. Verna Lefebvre will join **Betty Mullen** as a co-editor for the Journal and Iva Bradley replaces Nancy Craig as the Book Review Editor. Verna Lefebvre is an associate professor, Department of Secondary Education, University of Alberta, Edmonton, working in the area of home economics education. Iva Bradley is District Home Economist in the County of Lamont for Alberta Agriculture, Home Economics and 4-H Division. We gratefully acknowledge the good work **Nancy Craig** did as Book Review Editor.

Newsletters from provincial and local associations are one source of information for "Happenings". Having the Journal included on your mailing list would be helpful to us. Send to CHE Journal, Dept. of Secondary Ed., University of Alberta, Edmonton, Alberta T6G 2G5. •

1979 CHEA Award Winners



Deirdre Grondin

Mary A. Clarke Memorial Scholarship

Deirdre Francis Grondin, R.P.D.T., M.Sc. H.Ec. of Fredericton, New Brunswick was the 1979 winner of the Mary A. Clarke Scholarship. Deirdre is planning to enter the Ph.D. program in communication studies at Simon Fraser University, Vancouver, B.C. She is interested in increasing her understanding of the role of mass and interpersonal media in the development of consumer information programs.

Ruth Binnie Scholarship

This year it was possible to present two Ruth Binnie Scholarships. The winners were V. Gail Korpan, B.Sc. (H.Ec.) from Edmonton, Alberta and Patricia Gail Rogers Herbert, B.Ed. from St. Albert, Alberta.

Gail Korpan, a former high school teacher in home economics, crafts and industrial education in Edmonton, is working toward a M.Ed. degree in secondary education (art education) with emphasis on textile design. Her intention is to continue to teach at the secondary school level.

Patricia Herbert has been teaching home economics at Sir George Simpson Junior High School in St. Albert. She will go on to further study toward an M.Ed. degree specializing in home economics education with emphasis on areas of research, administration and family studies to improve her qualifications to teach at high school and post-secondary levels.



Gail Korpan



Patricia Herbert

Silver Jubilee Scholarship

The 1979 recipient of this award established to commemorate the 25th anniversary of the founding of CHEA is Rosemary Polegato, B.Sc. (H.E.), M.Sc. from London, Ontario. She is presently a lecturer in Clothing at Brescia College, University of Western Ontario and plans to enter a MBA/Ph.D. program at that university. Her research interests lie in apparel and textile merchandising and the economic aspects of the clothing and textile industries.



Rosemary Polegato

Carnation Company Incentive Award

The 1979 edition of this award was presented to Valerie Jean Hurry, B.Sc. (H.Ec), P.Dt., who is Community Nutritionist, Department of Social Services, Charlottetown, Prince Edward Island. As she is interested in metabolic or community Nutrition, she plans to study for a M.Sc. (Nutrition) at the University of Guelph, Guelph, Ontario.

Membership Incentive Awards

Starting in 1979 and continuing annually, a membership incentive award will be offered by CHEA to the student showing the most professional potential in each School, College or Faculty of Home Economics in Canada. The award is in the form of one year's membership in CHEA. The winners will be named by the Deans or Directors of Home Economics.

The following students were the recipients of this award for 1978-79:

- Janice Hines, Mount St. Vincent
- Theresa MacDonald, St. Francis Xavier
- Rosaline Duclos, Université de Moncton
- Charlotte Brodie, University of New Brunswick
- Carol Ann Walls, University of Prince Edward Island
- Ruth Zilinkas, McGill University
- Fay Mansfield, Ryerson Polytechnical Institute
- Martha Davidson, University of Guelph
- Nancy Lasko, University of Western Ontario
- Linda Strom, Windsor University
- Deborah Battigelli, University of Manitoba
- Cinda Jane Owen, University of Saskatchewan
- Claudia den Boer, University of Alberta

There were no nominees from Acadia University, Laval University, University of Montreal and the University of British Columbia. ●

ON THE COMMUNITY FRONT

A New Journal Column

A regular feature to be called "On the Community Front" will commence in the *Canadian Home Economics Journal* in the Winter 1980 issue. The purpose of the column will be to feature home economists who are volunteering their time, talents and expertise to aid members of the community in various ways. Thus we will not only recognize the work that many of our members are doing and the contributions they are making to society, but may give other members ideas and encouragement.

The column will feature home economists from a specific province each month **but will also include information from other provinces as well.** Home economists from British Columbia will be featured in the Winter 1980 issue and subsequently those in Alberta, Saskatchewan and on east will be featured in turn. Members are encouraged to submit a write-up about their volunteer work or that of another member. Information should be sent to the provincial director of the province to be featured in an up-coming issue. We are starting with B.C., therefore information for the first column should be sent to Pat Stearman, British Columbia Provincial Director, 4264, Musqueam Drive, Vancouver, B.C. V6N 3R7. Remember you don't have to be from B.C. to take part in the first column.

CALL FOR NOMINATIONS FOR CHEA BOARD OF DIRECTORS

Nominations are invited for the following positions on the CHEA Board of Directors.

Term of office to be 1980-1982.

President-elect

Vice-president

— should reside close to Toronto

Secretary

— should reside close to Toronto

Treasurer

— should reside close to Toronto

Provincial Directors:

British Columbia

Alberta

Ontario

Nova Scotia

Prince Edward Island

Standing Committee Chairmen:

Extension

Family & Human Development

Foods and Nutrition

Public Relations

This year, on a trial basis, CHEA will be conducting the election by a mail vote. This is to provide every member with the opportunity to vote.

Members will be advised of the proposed slate by February 15, 1980. Further nominations will then be accepted until March 31, after which time the mail vote will be conducted.

Therefore, please submit nominations by February 1, 1980 to:

Linda St. Onge
(Chairman, Nominating Committee)
6611 - 36A Avenue
Edmonton, Alberta T6K 0P5

All nominations including those submitted by provincial associations must be accompanied by:

- assurance of nominee's CHEA membership (membership number)
- signature of five CHEA members
- written consent of nominee
- a brief biographical sketch of nominee

CANADIAN HOME ECONOMICS JOURNAL

ADVERTISING RATES

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3rd	259.00
4th	286.00

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(206 mm x 276mm)

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Winter	— Nov. 15	Jan. 1
Spring	— March 1	April 1
Summer	— May 15	June 15
Fall	— Sept. 1	Oct. 1

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4519 - 107 Avenue
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JOURNAL THEME FOR 1980 "Conserver Society"

Each Issue has a Special Focus

- Winter — food & nutrition
- Summer — management
- Spring — housing
- Fall — energy

CHEA Supports Equal Work Opportunities for Women and Men

The following resolution was passed at the CHEA Annual Meeting July 11, 1979.

Whereas, the percent of working women in Canada has been increasing and has still not reached the level found in many other industrialized countries (5, 7, 8),

Whereas, women in Canada are often the sole earner in a household; and in households with two incomes, are increasingly significant contributors to family income (2, 3),

Whereas, women and men in Canada should have equal right to earn a living (1, 7) and not be involuntary wards of the state,

Whereas, the quality of life for men in Canada would be enriched by greater opportunity for sharing in family care,

Whereas, social expenditures of government are only moderate in light of other western industrialized nations (4, 6),

Be it resolved that Canadian Home Economics Association:

- Will adopt the following positions on public policy:
 - commitment to **increased opportunities for women** in the workforce and to training programs which will allow women to meet their potential in the workplace.
 - commitment to **the community support services** necessary to allow women to participate in the workforce. (for example, day care for children, elderly or handicapped dependents)
 - commitment to **provision of alternatives in employment** for men and women (e.g. facilitating part-time work, job sharing possibilities and administration of benefits)
 - Will communicate its position to appropriate federal government departments, Members of Parliament and national organizations,
 - Will both advocate and respond to federal government policies reflecting these positions,
 - Will develop programs to increase understanding of these issues among members and others (for example, a conference or workshop on family and work; issue of the C.H.E. Journal devoted to the topic)
 - Will encourage provincial and local Home Economics Associations in Canada to adopt these positions and a corresponding program of action.
- "Instead of research women need job aid, Broadbent declares". *Globe and Mail*, March 9, 1979
 - Mudry, J. et al "Children in Single Parent Families: Can the Home Economist Help?" *Canadian Home Economics Journal*, 29 (2) 61-64, 1979.
 - One in a World of Two's** — A report by the National Council of Welfare on one-parent families in Canada, April 1976.
 - Perspective Canada II** — A compendium of Social Statistics 1977, Statistics Canada
 - Policy Review and Outlook, 1979: Anticipating the Unexpected**, C.D. Howe Research Institute, Montreal (pp 140-163)
 - "Social Mythology and Social Policy". Notes for an address by the Honorable Monique Begin, at the annual meeting of the National Council of the YMCA's of Canada, Geneva Park, Ontario, May 27, 1978.
 - Towards Equality for Women**. Status of Women Canada, 1979
 - "Working women — force of the future". *Globe & Mail*, February 28, 1979

READERSHIP SURVEY

A Readership Survey to aid the editors in the evaluation of the content and format of the *CHE Journal* was sent to members with the Summer 1979 (Vol. 29, No. 3) issue.

By August 1, 1979, 140 survey forms were returned and the results tallied. The majority of respondents read most of the Journal and most of the advertising (see Table 1). Seventy-seven replied that they have followed up an advertisement. While 13 members responded that they keep each issue about a year, 79 said they keep it indefinitely.

Table 1
Amount of CHE Journal Normally Read

Item	N	Very Little	About Half	Most	All
Amount of Journal	140	7	41	67	25
Amount of Advertising	140	26	33	59	22

Professional development articles proved to be the most popular and Abstracts of Current Literature, Book Reviews, What's New, and New Publications and Visuals also rated very high (see Table 2). The editors will be cognizant of the preference members have for certain types of articles and regular features. Since no one version of the *CHE Journal* will suit everyone absolutely, variety in the content will be the editors' aim.

Table 2
Degree of Interest Indicated in Content of CHE Journal

Item	N	Low	Medium	High
Articles re:				
Professional Development	140	4	40	96
Personal Development	132	15	48	69
Reports of Research	136	15	76	45
Conferences, Workshops, etc.	132	20	74	38
Regular Features				
President's Message	134	42	58	34
Guest Editorial	133	21	81	31
Metric Up-date	134	38	44	52
Abstracts of Current Literature	139	11	44	84
Book Reviews	138	8	42	88
What's New (products, ideas, etc.)	131	7	27	97
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Features on Members or Committees	131	26	69	35
Publicity of Up-coming Conferences or Conventions	131	15	61	55
CHEA Committee Activities	125	19	69	37

A number of suggestions for the theme for the 1981 issues were made and a variety of specific articles requested. The French content is appreciated, a Letter to the Editor Column suggested as well as a comment made that a little humor wouldn't hurt our image. A concerted effort will be made to find authors for the articles suggested and to follow as many of the suggestions as feasible.

It was gratifying that 20 members offered to write a general or a research article because the most popular articles are those written by our own members. In addition ten members offered to write book reviews and three will contribute to the What's New column.

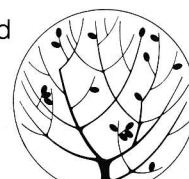
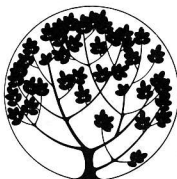
The overwhelming majority responded positively to the new format, cover and size. There were six members who preferred the smaller size for the convenience of carrying it around, two who liked the former format and two who preferred the maple leaf design of earlier covers.

The editors would like to thank the members for assisting them with this survey. If you haven't returned your survey form, please do so. Your input is important to us.●

COVER A MYSTERY?



Some of you have wondered about the meaning of the design of the Journal cover. As you have probably noticed the tree has changed with the seasons. It symbolizes the growth of our Association and profession.



CHEA Conference 1980

Saskatoon, Saskatchewan will be the site of the next Canadian Home Economics Association's Conference to be held July 14 - 17, 1980. The conference committee, chaired by Joan Finlayson and Leslie Henry has already been busy organizing people and thoughts to make 1980's meeting a great event for Canadian home economists. "Technology Yesterday, Today and Tomorrow" is the proposed theme.

Plan ahead. Plan to attend.

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Carl Jung

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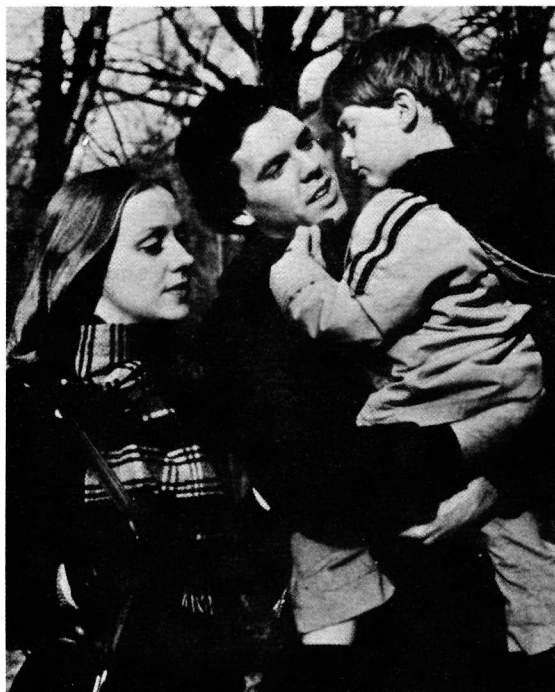
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